DOCUMENT RESUME

ED 302 603 UD 026 456

AUTHOR Butler, Anne S., Ed.; McNeely, Pamela V.
TITLE Black Girls and Schooling: A Directory of Strategies and Programs for Furthering the Academic Performance and Persistence Rate of Black Females K-12.
INSTITUTION Kansas State Univ., Manhattan.
SPONS AGENCY Women's Educational Equity Act Program (ED), Washington, DC.
PUB DATE Dec 87
GRANT G008610658
NOTE 117p.
PUB TYPE Reference Materials - Directories/Catalogs (132) -- Information Analyses (070)

EDRS PRICE MF01/PC05 Plus Postage.
DESCRIPTORS *Academic Achievement; *Academic Persistence; *Black Students; Curriculum Development; Demonstration Programs; Directories; Elementary Secondary Education; Equal Education; *Females; Multicultural Education; *Nondiscriminatory Education; Program Descriptions; Program Effectiveness; Sex Fairness

ABSTRACT

This document comprises a review of the literature on the academic performance and academic persistance of young, black females and a 50-item directory of multicultural, nonsexist educational strategies and programs for this population. Each of the strategies includes the following characteristics: (1) caring adults; (2) belief that schools can offer equal educational opportunities to minorities and women; (3) educators who believe in their own ability to influence students' lives; (4) student empowerment; (5) multifaceted approach to combating low academic achievement and high dropout rates; (6) curriculum and instructional materials that avoid sexist and minority stereotypes; (7) high expectations for student success; (8) parent involvement; (9) academic orientation; (10) peer support groups; and (11) early intervention strategies. Each listing includes a brief program description, and the name and address of a contact person. Strategies are grouped in the following categories: (1) Academic Performance; (2) Academic Persistence; (3) Personal/Social Development; (4) Career Exploration; (5) Employment; (6) Curriculum; (7) Staff Development; and (8) School Leadership. A chart provides a subject and educational level index. An extensive bibliography is also included. (FMW)

****
* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *
****

Black

A Directory of Strategies and Programs for Improving the Academic Performance and Persistence Rate of Black Females K-12

U.S. DEPARTMENT OF EDUCATION
Office of Educational Research and Improvement
EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)

☑ This document has been reproduced as received from the person or organization originating it.

☐ Minor changes have been made to improve reproduction quality.

• Points of view or opinions stated in this document do not necessarily represent official OERI position or policy.

"PERMISSION TO REPRODUCE THIS MATERIAL HAS BEEN GRANTED BY

Anne Butler
Ed. Supportive Services

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)."

We can, whenever and wherever we choose, successfully teach all children whose schooling is of interest to us.

We already know more than we need to do that.

Whether or not we do it must finally depend on how we feel about the fact that we haven't so far.

Ron Edmonds, 1982

BLACK GIRLS AND SCHOOLING

A Directory of Strategies and Programs for Furthering the Academic Performance and Persistence Rate of Black Females K–12

Anne S. Butler
Editor

Pamela V. McNeely
Office Manager

Technical Assistance

Iris Riggs, Graduate Research Assistant
Marjorie Williams, Graduate Research Assistant
Nancy J. Smith, Ph.D., Consultant
Carole Carter, Ph.D., Consultant
Georgia K.Garrett, Editorial Assistance
Lisa C. Rothel, Production Assistance
Suzie M. Wisdom, Typing Assistance
Kimberly Fouts, Office/Library Assistance
Joan Mulligan, Office/Library Assistance
Mary Hammel, Cover Illustration

Project No. G008610658: Strategies for Improving the Academic Performance and Persistence Rate of Black Females in K–12 Educational Settings

Kansas State University
Manhattan, Kansas
December, 1987

Women's Educational Equity Act Program
U. S. Department of Education
William J. Bennett, Secretary

No person in the United States shall, on the grounds of race, color or national origin, be excluded from participating in, be denied the benefits of, or be subjected to discrimination under any program or activity receiving federal financial assistance, or be so treated on the basis of sex under most education programs or activities receiving federal assistance.

This report was produced under a grant from the U. S. Department of Education, under the auspices of the Women's Educational Equity Act. Opinions expressed herein do not necessarily reflect the position or policy of the Department, and no official endorsement should be inferred.

Printed and distributed by
College of Education
Bluemont Hall
Kansas State University
Manhattan, KS 66502
Contact Person: Anne S. Butler
(913) 532-6436

Contents

Introduction 1

Purpose, Method 2

Definitions of Key Terms 3

Synthesis of the Research 4

Characteristics of Successful Strategies 7

Directory of Strategies 9

Academic Performance Strategies

Benjamin E. Mays Academy of Science and Mathematics 12
Mid-America Consortium for Engineering and Science Achievement (MACESA) 13
Summer Bridge Pre-College Engineering Program (PREP) 13
Recruitment into Engineering of High Ability Minority Students (REHAMS) 14
NUPRIME Progress in Minority Engineering Program 15
Academically Interested Minorities (AIM) 15
Minority Engineers Industrial Opportunity Program 16
Mathematics, Engineering, Science Achievement (MESA) 16
Bridge Program—Wabash College 17
Radcliffe Summer Program in Science 17
Summer Health Careers Academic in Enrichment Program 18
Summer Science Academy 18

Academic Persistence Strategies

Lula Bell Stewart Center for Young Parents 19
Generational Educational Equity Program (GEEP) 20
Lady Pitts—School Age Parents Program 21
Operation Rescue, Bardstown 21
Operation Rescue, San Antonio 22
Teen Outreach Program 22
Queens Teen Pregnancy Network, Inc 23
Operation Rescue On-Site Day Care Center 23
Continuing Education for Girls 24
Brooklyn Teen Pregnancy Network 24
Adult Center of Education (ACE) 25
Teen Pregnancy Reduction Network 25
Stepping Stone Program 26

Personal/Social Development Strategies

Black Family Preservation Project 27
Infant/Child/Parent (ICP) Development Project 29
Mother-Daughter-Sister Seminar 29
Youth Awareness Project 30
Women's Services Clinic 31

Career Exploration Strategies

FEMME—Females in Engineering 32
Program for Acceleration in Computer Science Careers for Minority Students (PAC) 33
High School Health Careers Summer Program 33
The Discovery Program 34
Engineering Summer Program 34
Project Opportunity 35
Tennessee Minority Health Careers Program 35

Employment Strategies

Career Beginnings Program—Indianapolis 36

Curriculum Strategies

Beyond the Stereotypes: A Guide to Resources for Black Girls and Young Women 37
Family Math 37
Life Styles 38
Just Between Sisters: Futures Unlimited 38
Project Seed, Inc. 39

Staff Development Strategies

Bay Area Mathematics Project (BAMP) 40
Equals 41
Shaping Teacher Expectations for Minority Girls: A Teacher Training Module 41
The Black Female Experience in America: A Learning Teaching Guide 42

School Leadership Strategies

Accelerated Schools Project 43
A Fact Pack for Educators 43
Mastery in Learning Project 44

Strategy Chart 45

Bibliography 53

Introduction

When the case of Brown v. Topeka Board of Education was resolved satisfactorily in 1954, advocates of educational equity thought that a milestone had been reached. As the Supreme Court justices ordered public schools to desegregate "with all deliberate speed," proponents for equal educational opportunities dared to dream the decision would hasten the "assimilation of diverse minorities to American culture" (Bell, 1980, p. 40). Thus, it was believed that Black children, such as the 8-year-old plaintiff, Linda Carol Brown, would realize the benefits of a quality and equal educational experience.

Some apparent good evolved from the Brown decision, but, today, more than thirty years later, we find that the Brown decision might have been more an illusion than the actual reaching of an educational milestone. Thousands of Black youth continue to experience serious problems in America's schools, and at all levels of the educational system. Some researchers point out that many Black, urban poor may be trapped permanently in an emerging "under-class" if the means to raise the quality of their educational experiences are not found "with all deliberate speed." Black females and their children constitute a disproportionate number of this group.

In one educational reform report after another, American educators are once again being called upon, by diverse groups, to recommit themselves and . . . to provide a quality education for all citizens, one characterized by a commitment to the principles and practices of a multicultural, nonsexist perspective. Such a perspective enables educators to be guided by a better understanding of the diverse needs of America's minority groups, than was apparent in 1954.

A major obstacle confronting researchers, educators and social service practitioners attempting to implement educational equity programs for students from diverse backgrounds is the lack of "identifiable, readily accessible sources of data" (Lewis, et al., in Klein, 1985, p. 380). The scarcity of adequate qualitative or quantitative data on Black females for instance, can be traced partly to exclusionary practices of many educational researchers. Until quite recently, an apparent assumption has been that all

Blacks are alike and all women and girls are alike. Thus, researchers studied each group as a separate research unit, and often neglected to collect data pertinent to individuals who comprise membership in both groups, such as Black females. Two distinct bodies of literature emerged, one that focused on the effects of race, and one that focused on the effects of gender as issues related to schooling and education. Seldom was class, as a third dimension of group membership, treated in an integrated manner.

Educators, researchers and advocates of race and sex equity programs now realize, however, th[illegible]hile gender discrimination affects all girls and women, and while race and class discrimination affects all minority groups, there are differential effects. The combined effect (race, gender and class) is greater than the sum of the individual parts. It is apparent then that a diverse population requires diverse strategies if progress toward implementing reforms for equity in education are to be realized.

In this report we provide a synthesis of the research on the educational experiences of Black females K–12. Also, we present descriptive data on strategies being used currently to address barriers to equity and excellence for high risk populations, especially Black females. Our review of such programs turned up few strategies tailored solely to Black females. Instead, strategies designed for Black females tend to be integrated with strategies that seek to eliminate the effects of other biases.

Finally, we present recommendations on characteristics of effective strategies. It is hoped that the strategies presented will foster an understanding of solutions to the educational problems and obstacles encountered by Black females. It is further hoped that these and similar strategies will be adopted by a significantly large number of educational agencies, parent, social service, and community organizations. Such measures are in the best interests of our nation for obvious reasons.

A project of this scope requires the support and assistance of many people. In addition to project staff, institute and dissemination meeting participants, we are deeply indebted to all the people who shared information and tips about strategies for inclusion in this report.

Anne S. Butler
Editor

PURPOSE

The barriers to equity and excellence in education for minorities and females are well known. Less well known, however, are solutions. Over the past two decades, numerous strategies and projects have been funded to increase equity in education for females and minorities. Such strategies attempt to reverse patterns of low academic performance and high drop out rates. While many of these strategies document important results, they are often not well known outside of funding agencies, host institutions and populations being served.

A realization that potential users rarely have "hands-on" access to information about promising intervention strategies for young Black females in K–12 educational settings prompted this study. The goal of this study is to identify and report on strategies that appear effective in increasing the academic performance and persistence rates of Black females. Since many of the strategies included are fairly recent innovations, formative and summative evaluation data were not always available. Such data is reported for several of the strategies, however.

Several questions guided our investigation. What do the various strategies offer in terms of services and skills? What are the differences between programs for Black females, and females in general, for both sexes, other racial populations? What is the impact of such strategies, and how do program activities and experiences relate to students' future roles?

Objectives for this study include the following:

to identify and disseminate information about successful strategies developed to improve the academic performance and persistence rate of Black females;

to determine the characteristics which most contribute to the success of strategies developed to improve the academic performance and persistence rate of Black females;

to disseminate guidelines for the development of successful strategies previously funded through federal, state, and local educational agencies and other related groups;

to train personnel in educational agencies responsible for the quality of education of Black females and provide information on planning the implementation of strategies to improve the academic performance and persistence rate of Black females.

METHOD

This study was conducted between December 1986 and 1987. Data were collected from an extensive review of the literature, and from direct solicitations for information on programs from sponsoring organizations and individuals known to include race and/or gender equity as one of their primary foci. These sources include memberships of several major education associations, Urban League and NAACP chapters, Black greek sororities, local education agencies, and numerous social service agencies. Once data was retrieved through library sources or received from sponsoring agencies, follow-up contact was made for clarifications where needed.

Additionally, the expertise of several leaders in the improvement of the academic performance and persistence rate of Black females was obtained. This group participated in a Spring 1987 Mary McLeod Bethune Institute on Race and Gender in Education held at Kansas State University, Manhattan, Kansas. Papers were presented and deliberated on topics related to the study. The group helped identify key characteristics of successful strategies based on the research and literature, as well as experience in the field. In addition to project staff, the institute group included Dr. Carole Carter, Coordinator of Research, Division of Student Affairs, Northeastern University, Boston, Massachusetts; Dr. Jancie Hale-Benson, Associate Professor of Early Childhood Education, Cleveland State University, Cleveland, Ohio; Barbara Cope, Acting Dean and Director for Special Services, University of Indiana, Gary, Indiana; Khadijah Matin, Consultant and former Assistant Director for the Sisterhood of Black Single Mothers, New York, New York; Joyce Williams, Counselor, Leavenworth High School, Leavenworth, Kansas, and Betty Royster, Graduate Teaching Assistant in Psychology, Kansas State University.

The recommendations and findings presented herein are based on a review of the literature, input from professionals, and from an examination of reports by national and state bodies that address educational reform for high risk populations. Chief among these documents are the results of three national surveys that investigated incidences of high school drop-outs: *Who Drops out of High School—Findings from High School and Beyond* (1987); *The National Longitudinal Survey of Youth Labor Market Experience* (1980); and *The Census Bureau Current Population Survey* (1982). Other sources which provided pertinent information included: *A Blueprint for Success* (1986) published by the National Foundation for the Improvement of Education; *Schools That Work: Educating Disadvantaged Children* (1987), U.S. Department of Education; *The Condition of Education: A Statistical Report* (1986), U.S. Department of Education; and *Impact on the Schools: Teen Pregnancy—A Special Report from the Education Research Group* (1987); *Handbook for Achieving Sex Equity through Education*, Klein, Ed. (1985); *Report of the Black Concerns Study Committee*, The National Education Association (1987); *Black and White Children in America* (1985), and *Model Programs: Preventing Adolescent Pregnancy and Building Youth Self-Sufficiency* (1987), both by the Children's Defense Fund.

DEFINITIONS OF KEY TERMS

Equity education is a concept based on the basic, democratic promises of public education—that all students, regardless of race, color, ethnicity, religious preference, sex, age, handicap, native language, economic status, sexual orientation or family structure have the right to an education of equal quality.

Multicultural/nonsexist education is the interfacing of processes and practices within educational systems that result in promoting knowledge about, understanding and appreciation of the contributions of men and women from varying ethnic backgrounds. Such a perspective results in a world view that is inclusive, free of ethnic and gender biases, and historically correct.

Strategies include teaching methods and projects, learning tools, curriculum and school innovations, motivational techniques, staff development and similar activities that help improve the academic achievement and per-

sistence rate of Black females. Of particular interest to this study are strategies that generate in participants high educational goals and that provide the skills, resources and support necessary for students to have reasonable expectations of obtaining the goals.

While these strategies do not exhaust the many options that have been developed to foster high educational aspirations and attainment among Black females, these strategy types represent some of the more pervasive and effective of those developed.

Academic performance may be defined and measured in a variety of ways. Most measures of academic performance include grade point average (GPA), and/or the results of standardized achievement test scores. Academic performance is defined more broadly here than in the traditional sense. It is a measure used in relationship to progress or movement towards completion of an educational milestone. While inclusive of academic competencies, it includes also factors such as the ability to recognize and cope with interpersonal and other common problems related to the pursuit of education. It is noted, however, that sufficiently poor performance on the part of an individual student can lead to the termination of her educational progress and persistence.

Academic persistence, also, is defined in relation to completion of an educational milestone, namely, high school graduation. Persistence implies continued and sustained effort towards achieving a goal. Most educational agencies have their own measure for calculating persistence and drop out rates. Pallas (1986) differentiates between types of school drop-outs. According to his model, drop-outs may be classified as "stay-outs" or "returnees." "Stay-outs" are those who drop out and never return to an educational system, while returnees are drop outs who have returned to an educational system at least once. "Educational system" may include the same school previously attended, other educational settings such as alternative school programs, and credentialing programs such as the general education development program (GED). Further, Pallas' model denotes two types of returnees, "drop-ins" who may come and go repeatedly without receiving a diploma or GED certificate, and "returnee–completers," who eventually earn a diploma.

Synthesis of the Research

Academic Performance

Emerging research on the achievement level of students in American public schools reveals disturbing trends for young Black females, especially those from lower socio-economic backgrounds. The academic performance of this group is lower that that of students from higher socio-economic backgrounds, and they drop out of school at a higher rate than White males and females. These facts have been documented by numerous studies (Rumberger, 1983; Scott-Jones & Clark, 1986). Moreover, the results of the National Assessment of Educational Progress (NAEP) have shown consistently that the academic performance of Black females is below that of White students, and this performance gap widens as Black females matriculate to higher levels. Scott-Jones & Clark (1986) report that at age 13, Black females and males did not differ in their mathematical achievement, although both groups' academic performance was substantially lower than that of their White counterparts. By age 17, however, significant sex differences showed up for both Black and White groups with Black males outperforming Black females as did White males and females.

Other researchers point out that lower socio-economic minority and female students fall disproportionately at the bottom of the educational hierarchy operating in most schools. They have lower persistence, that is, number of years of schooling and lower academic performance as measured by grades, standardized test scores, and type of school curriculum completed. It is important to recognize, however, that lower socio-economic status does not always produce maladjustments and dissonance detrimental to the self-esteem of Black children. The importance of family occupation and income are not to be overlooked, however (Rumberger, 1983; Shade, 1978). A review of most studies that include income and occupation level within race and sex groupings support that the *real* difference between achievers and nonachievers is the family's perception of their place in the social order.

The balance of power between families and schools is viewed as a critically important ingredient of educational success for Black children (Comer, 1987). Lightfoot (1980) asserts that "as long as power relationships between minority communities and White middle class schools remains

asymmetric, parents will feel helpless and threatened by the overwhelming dominance of the school" (p. 16).

Several researchers contend that minority females are both an ignored and invisible population in most research literature, in curriculum materials, and in classroom settings (Sadker & Sadker, 1982; Lightfoot, 1976; and Shakeshaft, 1986). Research conducted by the Sadkers (1982) addresses the need for educators to understand inequities they create in their schools and classrooms through traditional policies and practices. Six forms of bias were detected and explained by the Sadkers. These include:

- invisibility—the omission of women and minority groups from mainstream curricular materials. Such an omission implies that these groups are of less value.

- stereotyping—children who see themselves or their reference group portrayed only in stereotypic ways may internalize the stereotypes, and fail to develop their own unique potential.

- imbalance/selectivity—presenting only a narrow, one dimensional view of subject matter results in a restricted and biased perspective.

- unreality—curricular materials that exclude the contribution of minorities and women present an invalued, unrealistic portrayal.

- fragmentation/isolation—the separation of issues related to racial and gender groups from the main content implies that these issues are of less substance. [Such practices are common with the treatment of academic content on Blacks relegated to February, Black History Month, and March, Women's History Month.]

- linguistic bias—the predominant use of masculine terms and pronouns often denies the participation of the feminine gender in our society (1982, p.72-73).

Research completed by Mary Budd Rowe (1986) with 500 pairs of elementary school children on problem-solving skills and degree of perceived fate control placed Black females at the bottom of the performance scale. Children were paired by same race, by same sex, by mixed race, and by mixed sex groupings. In that study, pairing a Black female with a White female resulted in performance more similar to the low scores of Black females than the higher scores of pairs of White females. Rowe suggests that Black

females may function from a perception of possessing little control over the quality of their learning situations. In another study that measured the perceived effect of fate control and cognitive field dependence, Garner & Cole (1986) report three predictors of failure for low socio-economic background children. These include: 1) those who attribute failure to external forces; 2) those who are not analytical; and 3) those who are sensitive to social cues.

Is there evidence that educators are directly contributing to the low academic performance and persistence rate of Black females? Investigators have demonstrated the relationship between receiving direct instruction from the teacher and academic performance (Brophy, 1982; Rosenshine, 1978). Also, in a pioneering study, Rosenthal & Jacobsen (1968) tested the effect of teacher expectations on interactions, achievement levels, and intelligence of students in an elementary school with a high percentage of lower socio-economic ethnic children. Their study demonstrated that children respond to the expectations teachers have for them, positive or negative. Once this pattern is established, it is difficult to alter.

Recent research by Sadker & Sadker (1985) and Grant (1986) has found that Black females receive the least amount of classroom interactions with teachers. In addition, they found that instruction received by Black females is less substantive. They are more likely to be praised for behavior than for content related performance. Grant (1984) observed race-gender status differences in six elementary classrooms in a mid-western working class community of 40,000 residents. She found that school induced factors result in Black females receiving subtle messages to assume stereotypical roles of Black women in America. For example, Black females were called upon by teachers, almost twice as frequently as any other race-gender group, to help peers in nonacademic matters. "This contrasted," writes Grant, "with the teacher's tendency to look to White girls for academic related special tasks such as tutoring" (p. 107).

Other researchers contend that Black children, regardless of the region in which they live or the socio-economic status of their families, are aware of the social devaluation placed upon their racial group by the larger society (Hale-Benson, 1986; Norton, 1983). The awareness of this devaluation does not necessarily surface in the child's self-perception. Black children, as do other children, form a sense of self based on interactions within their immediate physical and social environment, more so than from the society at large.

Black females appear to receive less mixed peer interaction in desegregated classrooms (Grant, 1984; Rosenberg & Simmons, 1971). Black males appear more readily accepted in desegregated classrooms because of their athletic ability.

That schools respond to children of varying race-gender statuses in systematically different ways is documented in the literature (Grant, 1986; Hale-Benson, 1986; Klein, 1985; Shakeshaft, 1986). This behavior is thought to reinforce differential performance in the classroom. Certain school policies can influence groups negatively. For instance, standardized testing tends to favor middle class White students. Ability grouping and tracking clearly falls along class and race lines. Several investigators suggest that schools continue to have a middle class bias, and are more closely aligned with the values and behavior patterns of White middle class males, who receive more academic interactions than all other groups.

Self-esteem and educational aspirations are two areas frequently studied. Simmons, Brown, Bush, Blythe (1978) measured the self-esteem and academic achievement in a sample of 798 Black and White adolescents that were making the transition from grade six to seven. Their basic findings on self-esteem were that Black children appear to have higher rather than lower self-esteem than Whites; that girls of both races demonstrate lower self-image than do boys; and Black children from broken families fare worse in terms of self-esteem in desegregated, rather than segregated schools.

Gibbs (1985) reports preliminary results of a study which investigated the psycho-social adjustment of a multi-racial sample of 387 urban, adolescent females in grades seven to nine. Her findings suggest that "Black and White teenage girls are more similar than different in their attitudes and aspirations" (p. 29). This study provides evidence of a discrepancy between the career aspirations of Black females and their realistic plans to achieve them. Similar findings on the discrepancy between career aspirations and achievements have been reported by Smith (1981), and Burlew (1977). The latter two researchers suggest that Black females be exposed to information about available career and educational opportunities, and that they be encouraged to re-examine traditional ideas both about the role of women, and the consequences of stepping outside traditional, stereotypic boundaries.

Smith (1981) indicates that little empirical or survey data exist to support the theory that young Black females are socialized within their families to achieve and aspire to a higher educational and career level than Black men. Burlew (1977) recommends that comparative studies of Black females should be made with White males rather than White females. She suggests that comparisons to White females may often be misleading, since the norm is based on the status of White males.

According to Gibbs, another factor which impedes the career development of Black females is that they have fewer opportunities for work experience, and fewer role models. This makes it more difficult for Black females to formulate realistic educational plans.

Other studies have identified various factors that cause or predict the likelihood of dropping out of high school. Some of these studies are based on psychological and social science research where the focus is on changing the individual's ability and aspiration levels, to a focus on family background, and to the effects of environmental factors, including the school's structural organization, geographic location, social, cultural, political and economic climate.

Academic Persistence

The evidence related to the low persistence rate of Black females is equally clear. According to the 1981 Census Bureau records, the drop out rate for Black females was higher than for Black males, White males or White females. Other data reported by Scott-Jones & Clark (1986) further document the high drop out rate for Black females. One of their sources cited the drop out rate for Black females at 45.7 percent as recently as 1982. This percentage is nearly twice that of the average drop out rate for all youth and almost four times greater than that of White females. Major reasons cited for leaving school include disliking school and pregnancy.

Rumberger (1983) reports on the high school drop out problem using data from a 1979 national sample of youth 14–21 years of age. His analysis focused on differences by sex, race and family background. Among his major findings were "the probability that a young Black woman from a lower social class background is a high school drop out increases by 40 percentage points if she had a child within 9 months of leaving school" (p. 209). Further his study reports that "family background influences the probability of dropping out of school for members of all race and sex groups. Young

women are more highly influenced by their mother's education level, while young men are more often influenced by their father's educational level" (p. 201). This supports the work of other researchers (Biddle, Banks & Marlin, 1980; Davies & Kandel, 1981) who report that parental influence on the adolescent's aspirations is stronger than peer influence and this influence does not decline over the adolescent years. Scott-Jones (1984) reports that "parental expectations that are high but not completely out of line with the child's current skills are associated with high levels of performance on cognitive tasks" (p. 292). Rumberger (1983) reported that higher levels of educational aspirations reduces for all groups, the likelihood of dropping out of school. Phelan (1987) reports that at least half of all drop outs have academic averages of "D" or lower. He contends that such performance is likely correlated with a general disinterest or perhaps hostility toward school.

A major thrust of the present research is that many variables operate as factors that contribute to an individual's chances of dropping out before high school graduation. Some of the factors are individual behaviors and attitudes, and some are school induced factors. Evidence indicates that subtle sexism, racism and class bias occurs at all levels of the American educational system. Black females often do not receive the same quality of instruction as White students. They are more socially isolated in desegregated classrooms than Black males, and they receive less teacher and peer attention. Grant (1984) contends that in subtle ways most Black females are encouraged to assume stereotypical roles of Black women in society, rather than to strive for alternatives. It is not surprising then that some Black females become discouraged and report not liking school. A major consequence of the lack of a quality educational experience for these young women is a high rate of dropping out of school. Thousands of young Black women are leaving school before graduating.

These young women are experiencing difficult times outside school as well. According to 1983 data from the U.S. Department of Labor's Women's Bureau, the unemployment rate among Black teenage females exceeds 48 percent.

Both the individual and societal costs associated with dropping out of school are enormous. Young Black females who leave school face unemployment, early motherhood, single parenting or all three. They are disproportionately represented in statistics which illuminate the feminization of poverty.

Officials with the Children's Defense Fund (CDF, 1985) tell us that "whether Black or White, young mothers under age 25 heading families are very likely to be poor, and young Black mothers are likely to *remain* poor" (p. 46). Other sources indicate that nearly 48 percent of all Black families are headed by single women. CDF tells us further that, "almost two Black children out of five are growing up in a family whose head did not complete high school, twice the rate for White children. White children are almost four times more likely than Black children to live in families headed by college graduates" (p. 89).

Without intervention, a pattern of low education attainment, low paying jobs, high unemployment, and low income is likely to continue throughout the lives of most of the young mothers and will result in long term socio-economic disadvantages to their children. These and other findings demonstrate that the need for improving the academic performance and persistence rate of Black females has been well documented. Successful strategies to accomplish these tasks have been developed and are reported in the following section. What is needed is a conscious will and determined effort, a belief in the worth and value of all students.

CHARACTERISTICS OF SUCCESSFUL STRATEGIES

An examination of findings from the research and results from national studies indicates clearly that several factors are key to the development of effective strategies for young Black females. Such strategies are characterized by the presence and assistance of caring adults and:

- A strong belief that schools, as one of our nation's primary social institutions, is a place in which "equity" can be generated through a sound educational program, one that promotes a multicultural, nonsexist perspective to education. This perspective shapes both attitudes and practices, and resonates not only from the building level, but throughout the district and surrounding community.

  A multicultural/nonsexist perspective is accompanied by a practice of equity in all school policies, in hiring patterns and in the allocation of financial resources.

- Educators, especially White educators, that have a strong sense of self-efficacy; a belief that s/he, as an individual, can make a positive difference in student destination, particularly for Black students. Such educators consciously examine and re-examine their

own attitudes and behaviors for race and gender biases and stereotyping. Also, they help sensitize and develop awareness of race and gender biases among colleagues and other staff working with them.

- Student-empowerment—the development of an effective support system for students; one that promotes a sense of belonging and makes use of pedagogical approaches that facilitate positive interactions between and among all members of the class. Such approaches empower students and encourages them to assume greater control over their own learning experiences.

- A multifaceted approach to combat low academic performance and high drop out rates. Strategies range from the development of basic academic skills to technological skills; sex and family life education, including strategies for conflict management and resolution; self-esteem building and personal/social development; career counseling and job skills training; to extended family services and paid work experience.

  Several single dimensional approaches, emphasizing only one of the above elements, have been tried with high school dropouts. Generally, such programs have failed to have a large scale impact. Programs that work well for Black females include both sexes, and sometimes other minority group members. Such strategies adopt policies that ensure all minority group members are not treated alike. Rather, the staff demonstrate an understanding of each individual's cultural and socio-economic background.

- Curriculum and instructional materials that make use of non-stereotypic images of women and minorities. Inclusive language is pronounced, and the curriculum plan is one that provides a positive integration of women and minorities in all subject areas, and in a valid and historically correct context.

- A commitment to teaching and learning that is designed to stimulate and "turn-on" students to education. School officials and teachers consider and understand the importance of conveying high expectations and encouragement for all youth, especially young Black females.

- A strong parent involvement component. The "help base" is broadened to include the student and her/his family. Parents are actively involved in all aspects of determining policies, setting goals and making decisions.

- Academic orientation—such programs recognize that some Black children may enter school with less reading experience and with less exposure to educational activities than their majority, middle class counterparts. These teachers provide students with an on-going academic orientation— one that helps students become acquainted with the school, its culture, mission and goals. Such programs provide students with help in addressing personal problems, and with identifying material resources. Also, students are provided with assistance in learning to negotiate the system, and in identifying both personal and institutional obstacles and blocks to self-empowerment.

- The training and use of peer support groups is an integral part of effective programs for at-risk youth in general, and for Black females in particular. Such strategies enable students to collaborate actively with each other in achieving educational goals.

- Early intervention strategies—such strategies build in strong self-esteem development components, and help students develop a critical awareness of destructive social patterns such as drug abuse, teen pregnancy and similar concerns.

When considering the components of successful strategies for Black females, it is necessary to include the characteristics of effective schools, as well as effective drop-out intervention programs. Ron Edmonds (1982) in presenting factors present in effective schools cited the following:

a) strong leadership by the principal;
b) an explicit statement of commitment to educational goals;
c) a school environment that is calm, and reflects a caring attitude;
d) teachers that accept the responsibility for each student's progress; and
e) a system for frequent monitoring of students' progress.

Educational reports on dropout intervention strategies also show that the presence and assistance of caring and well qualified staff can make a difference in student outcomes. For example, among the seven principles cited by the National Foundation for the Improvement of Education in it's *Blueprint for Success*, is the call for "a clearly articulated vision—and the taking of risks, the chancing of failure; the unrelenting persistence to begin again and to keep trying" (p. 7). The NFIE calls also for "restoring a human centered base to our schools," school staff, teachers, counselors and administrators that provide students with close supportive relationships; and small classes with lots of teacher encouragement and support. Doubtless, the architects of this study recognized that the teacher's time and attention are the most valuable resources in the classroom. Aware and concerned teachers understand their power and seek to provide a balanced distribution of time and attention to individuals across race and gender groupings.

While a variety of strategies have been developed to address issues of educational equity, no single "blueprint" exists that will work for every school. The most effective strategies for achieving race and gender equity involve many different approaches to change. It is essential, when planning change, that a comprehensive needs assessment be undertaken. Generally, a comprehensive needs assessment involves parental, student, and local community input at all levels of planning and implementation. Such an assessment includes ethnic, cultural and socio-economic characteristics of the population assessed, and results in a detailed description of needs listed in priority order.

Other essential steps when planning for change include articulating the mission and how goals for equity are tied to that mission; providing adequate time for well-trained staff to conduct the program; delineating objectives and activities that are clear, measurable, and based on the priority needs of the population; allocating appropriate resources and funds to support the project activities; establishing advisory councils or other collaborative teams that will provide advisory and monitoring functions. As a final step, an evaluation component that includes a framework for determining the consistency with which day-to-day behaviors reflect the mission statement must be developed and implemented.

The Directory

Fifty strategies were selected for inclusion in this report. While the strategies are diverse in their purpose, organization and structure, a common thread is evident. Most of the strategies are directed toward addressing two or more of the following areas: academic performance and persistence; personal and social development; information and referral services; parent and family involvement; curriculum; staff development and school leadership.

The strategies range from elementary to pre-college levels, with the majority clustering at the middle and high school levels. While a few strategies are limited to issues connected with early childbearing, most are comprehensive in their program offerings.

Support and sponsorship of the strategies come from a variety of arrangements between teachers, local school administrators, university and college faculty, parents, community organizations, social service agencies, business and professional organizations, and foundations.

Each strategy is designed to help students acquire essential academic and life planning skills. The strategies focus, also, on helping to motivate youth and increase their self-esteem and sense of empowerment. In a similar vein, exposure to math/science based career options and employment experiences is a major part of most of the strategies. Strengthening leadership skills and teaching students to negotiate academic, social service and governmental systems is included in many of the strategies as well.

Several strategies illustrate how the various areas have been incorporated to achieve both short term intervention and long term prevention goals. One such program, the Black Family Preservation Project (BFPP), is a school/community partnership designed to address a high rate of early childbearing among young Black females, and long range concerns regarding the structure of the Black family.

In recognizing the value of early intervention, the strategy (BFPP) is directed toward middle school students. Five hundred students are served through one or more of seven different program components which range from teen action labs to parent forums. Strategies are designed to address the following and other youth issues: male/female roles; sexuality and attendant responsibilities; personal and social growth including health and nutrition; responsibilities of teen parents, including fathers, and communication patterns between family members.

Included in the overall design is a training component for community volunteers that work with all facets of the program. Also, a research design enables the tracking of participants after their exit from the program, and provides information on the impact of the strategies on youth served.

Another school based program, Family Math, focuses on parents and children learning math together. Courses are taught in clusters of grade levels such as K-3, 6-8. Both male and female role models that are employed in math-based occupations participate in the program to help students and their parents make the connection between the math curriculum and future employment opportunities. A Family Math course teacher may be a classroom teacher, parent, teacher aide, community college instructor or a retired person.

A college-school-business initiative, Career Beginnings, is designed to help high school juniors from low-income families strengthen their chance to graduate from high school and obtain a full-time job or go on to college. Included in this strategy is a mentor for each student participant, a job skills and college application component, a quality summer work experience for each participant, and year long support services which include academic support and counseling.

In the tradition of "self-help," the Sisterhood of Black Single Mothers offers a youth awareness strategy. This strategy is designed to provide youth with support and enrichment activities such as counseling, career and leadership development, field trips, seminars and workshops, and cultural activities. Also, among its multiple strategies, the Sisterhood works to achieve viable support systems for Black single mothers, and aids these mothers with role models, advocacy services, and information leading to a better quality of life for both mothers and children.

Several strategies address curricular issues. The National Black Child Development Institute, for instance, published a recent resource guide aimed toward counteracting stereotypic images of Black girls and women in instructional materials, and the media. The guide contains strategies for selecting appropriate resources as well as suggestions on how the materials might be used by educators, parents and social service workers.

In the next section, these and other strategies appear in both narrative and chart form. The strategies provide a description of efforts that work. Fundamental questions need to be raised about the local educational experiences of Black females prior to designing a strategy. Such questions might include the following:

What is life like in desegregated schools for the average Black girl? in segregated schools? in urban and rural geographic regions?

From whom does she acquire educational aspirations? role models?

Is there a significant difference between her academic achievement and achievement levels of other students?

Is she challenged to assume nontraditional roles or subtly induced to assume the more stereotypic image of Black women?

Is there evidence that her participation is sought and valued in all school activities? Answers to these and other questions will, hopefully, set the stage for a positive plan of action to increase educational equity for Black females in K–12 educational settings.

Academic Performance

BENJAMIN E. MAYS ACADEMY OF SCIENCE AND MATHEMATICS

Benjamin E. Mays High School
3450 Benjamin E. Mays Drive, SW
Atlanta, Georgia 30331
(404) 696-0900, Ext. 13

The Benjamin E. Mays Academy, sponsored by the Atlanta Public Schools, is a highly selective arrangement of students and staff concentrating in the disciplines of science, mathematics and communicative arts. Students accepted into the Mays Academy face a rigorous academic schedule throughout their high school years. Courses are both accelerated and enriched; yet, small classes help ensure that the students' individual needs are taken into account.

The Benjamin E. Mays High School is the home school for all students accepted into the Academy. Applicants should have completed and demonstrated proficiency in first year algebra and one year of physical science (in middle school or the eighth grade) prior to applying for admission. Other selection criteria include: (1) career interests, (2) initiative, (3) high academic ability, (4) teacher recommendations and (5) high performance on the science, mathematics and language portions of the STEP test. Once accepted into the program, all students are expected to maintain above average performance in their classes.

The Language Arts Program emphasizes oral and written communication, development reading and technical writing skills. The mathematics and science courses emphasize independent research, logical reasoning, critical thinking, theoretical applications, and mathematical computations. The science curriculum may include human physiology, trigonometry, computer science, chemistry and physics as well as advanced placement courses.

Academy students are actively involved in seminars, workshops, field trips, science and mathematics competitions, academic tournaments and other activities. The Academy students make up a high percentage of the membership of the National Beta Club, the National Honor Society and the

Student Government Association. Also, a high percentage of the students are involved in the marching and concert bands, the chorus, orchestra, varsity athletics, including cheerleading, and other academic clubs and organizations.

The Mays Academy has distinct linkages with the Georgia Institute of Technology, Georgia State University, the Atlanta University Center for Graduate and Undergraduate Programs, the Morehouse College Medical Education Program and Emory University. The Academy has been adopted by Scientific Atlanta and the Federal Aviation Administration. These groups, along with the Academy Advisory Board, provide the academic staff with support and assistance. Also, since the program is highly specialized, many professionals are recruited from the Atlanta area to teach units and/or modules.

Students attending the Academy have compiled an enormously successful record of achievement in academic competitions and as scholarship recipients at the city, state, national, and international levels. The school's graduates attend colleges and universities throughout the country.

MID-AMERICA CONSORTIUM FOR ENGINEERING AND SCIENCE ACHIEVEMENT (MACESA)

Office of the Dean of Engineering
144 Durland Hall
Kansas State University
Manhattan, Kansas 66506
(913) 532-5949

MACESA is a partnership of high schools, universities and industries working with parents and community groups in the states of Kansas, Nebraska and Missouri. Its purpose is to combine resources in order to provide educational opportunities and enrichment activities for Black, Hispanic and Native American students.

MACESA's goal is to increase the number of well-prepared minorities entering and successfully completing college programs in science, mathematics and engineering. MACESA's student participants are guided through college preparatory classes and enrichment activities by a math or science teacher serving as the MACESA advisor at each of the participating high schools. Other experiences provided students include academic counseling, tutoring and study groups; college and career exploration; field trips; summer residential experiences at sponsoring university campuses; role models and speakers.

MACESA graduates are given priority consideration for engineering scholarships in participating universities.

MACESA was established with a three-year seed grant from NACME, the National Consortium for Minority Engineers. Additional funding is provided through corporate sponsors and participating universities.

SUMMER BRIDGE PRE-COLLEGE ENGINEERING PROGRAM (PREP)

Morris Brown College
643 Martin Luther King Jr. Drive, NW
Atlanta, Georgia 30314
(404) 525-7831

PREP is a pre-college academic program for students attending Atlanta metropolitan high schools. Twenty five college bound minority students are selected from Atlanta high schools to participate in the summer session. PREP consists of six weeks of intensified instruction in chemistry, pre-calculus, and critical thinking. Participants attend seminars on engineering career options, minorities in engineering, and minority contributions to the advancement of science and technology. Role models from local industries interact with participants throughout the session. Field trips are taken to local research facilities and one out-of-state research facility.

An Engineering Career Awareness Program is held for the students during the academic year. The primary purpose of the program is to help pre-college minority students acquire the academic skills and motivation required to complete a post-secondary program in engineering.

This program has been previously conducted for minority students in eighth and ninth grades. At least 50 percent of the participants are minority females.

Funding for the program is through Morris Brown College and the Department of Education.

RECRUITMENT INTO ENGINEERING OF HIGH ABILITY MINORITY STUDENTS (REHAMS)

College of Engineering
Louisiana State University
Baton Rouge, Louisiana 70803
(504) 388-5731

REHAMS Phase 1

This is a four-week summer residential, pre-college academic enrichment program designed to acquaint minority students with engineering fields and enhance the environment of minorities in engineering. Completion of the junior year of high school and evidence of high achievement are two of the eligibility criteria.

During the program, participants receive an introduction to eight different fields of engineering through faculty–student interaction and through coursework in mathematics, computer usage, and oral and written communication. Coursework is supplemented with analytical and conceptual modes of thinking designed to help students acquire an understanding of methodologies for solving engineering problems. Participants are assigned projects that require the application of engineering principles. Field trips are taken to area industries where students again observe the work of engineers.

A senior engineering faculty member directs the program and is assisted by residence hall counselors who offer guidance and career and academic counseling to participants.

The program is co-sponsored by the LSU College of Engineering and the EXXON Educational Foundation. Expenses for room and board (excluding weekend meals), books, instructional supplies, health insurance, and transportation for field trips is provided.

Individual student performance is evaluated and used in the selection of participants for future programs such as REHAMS 2 and in the awarding of scholarships for students who enroll at LSU.

REHAMS Phase 2

This program allows high school graduates to enroll in LSU's engineering curriculum for an early start. Financial assistance is provided for room and board, tuition and health services. Admission to LSU is required and students are enrolled for six hours of college credit in selected basic courses in the engineering curriculum including mathematics, English, graphics, and computer programming.

Academic tutoring is provided and the entire experience requires strict academic involvement.

Funding for this program is through the LSU College of Engineering and Industry.

NUPRIME
Progress in Minority Engineering Program

College of Engineering
Northeastern University
Boston, Massachusetts 02115
(617) 437-5904

NUPRIME is designed to increase the number of qualified minority high school students preparing for careers in the engineering profession. A second objective is to increase the number of minority students enrolling in Northeastern's College of Engineering.

NUPRIME is supported by the University and Sippican Industries, Inc., and is governed by a Sippican coordinator, Northeastern University faculty and a Parents Committee. Scholarship funds are provided by Sippican, Inc., and distributed by Northeastern University to all students participating in the engineering, computer science or engineering technology programs.

The Parents Committee promotes and supports the program by helping with the recruitment of students and arranging transportation for classes and special events. Parents also plan and coordinate field trips, social and cultural experiences.

The class structure for the program includes remedial work for students who earn 'C' or less math averages. Enrichment courses in algebra, geometry, pre-calculus and physics are scheduled. Class sessions are scheduled weekly September through May.

At the college level NUPRIME provides free academic support in engineering course work, study skills and communication skills. Students are assisted with securing financial aid and co-op and employment opportunities.

The program graduates approximately 30 minority engineering students each year. The retention rate for minority engineering students in NUPRIME is currently equal to the retention rate for the entire Northeastern University Engineering College. Surveys of NUPRIME graduates in the workforce indicate continued professional advancement in engineering careers.

ACADEMICALLY INTERESTED MINORITIES (AIM)

A Program of GMI Engineering
and Management Institute
1700 West Third Avenue
Flint, Michigan 48502-2276
(313) 762-7907

AIM is a six-week residential program designed to assist minority high school seniors make a successful transition into college. The program offers students instruction in mathematics, chemistry, computers, communication and study skills. Also, students explore careers in engineering and management through on-site visits to selected sponsoring organizations.

MINORITY ENGINEERS INDUSTRIAL OPPORTUNITY PROGRAM (MEIOP)

Case Western Reserve University
Baker Building, Room 116
Cleveland, Ohio 44106
(216) 368-2904

The Minority Engineering Program at Case Western Reserve University is divided into three phases—Phase One: The Case Early Exposure to Engineering for Minority Students (CEEMS) for ninth or tenth graders with a desire to learn about engineering; Phase Two: The pre-college phase of the Minority Engineers Industrial Opportunity Program (MEIOP) for eleventh graders; Phase Three: The Minority Engineers Industrial Opportunity Program for undergraduates enrolled in the university's Engineering College.

The program's design includes exposing minority students to careers in engineering, providing more extensive preparation for entry into a highly technical field than is possible in area high school classes, improving students' preparedness for and performance on college entrance examinations, and providing positive role models for aspiring engineers.

The pre-college phases begin with a five-week summer session at the university's campus. Those sessions are Monday through Friday beginning at 9 a.m. Intensive instruction in mathematics, physics, expository writing, and speech is provided. Also, students participate in engineering laboratory experiences.

Students who successfully complete the summer program are invited to participate in an academic year Saturday program. These classes provide more academic work in mathematics and communication skills, and preparation for college entrance exams. Academic, personal, and career counseling is available to all participants. Recommendations of counselors, teachers, and parents are considered when selections are made. Funding for the program comes from the university, industry, and foundations.

MATHEMATICS, ENGINEERING, SCIENCE ACHIEVEMENT (MESA)

Lawrence Hall of Science
University of California
Berkeley, California 94720
(415) 642-3167

MESA is designed to increase the numbers of high school students from minority groups that prepare for and enter careers in math, science and engineering disciplines.

From its inception in 1970 with 25 students, it has grown to serve 131 high schools and during the 1982–83 academic year reached 3,400 students. Evaluation data indicate that 90 percent of MESA students have attended a college or university with more than 66 percent pursuing studies in a math, science or engineering field.

Financial assistance from the Hewlett Foundation and the Alfred P. Sloan Foundation enabled the project to expand statewide.

BRIDGE PROGRAM

Wabash College
Crawfordsville, Indiana 47933
(317) 364-4301

Wabash College's Bridge Program is an academic achievement program designed to encourage students to achieve good grades and to attend college.

The program is open to high school students at two predominantly Black Indianapolis public schools, Crispus Attucks High School and George Washington High School. Approximately 50 percent of the participants are female. The program provides students with a rigorous academic curriculum attractive to colleges and universities. Students participate in academically-oriented field trips throughout high school. They also attend two, 13-day summer sessions on the Wabash campus following the sophomore and junior year. Fifteen to thirty students are in each class. These sessions count for high school credit and, in addition to strengthening academic skills, provide students with first-hand experience in learning that college life is manageable for them. Tutoring, and academic/financial counseling for college are provided.

The student pays nothing. The program is operated with financial support from Wabash College, the Lily Foundation, the Joyce Foundation, and the Association of American Colleges.

The program is helping reverse the trend of declining enrollment among Black students. Between 1981 and 1985, college acceptance rates for graduating seniors at Crispus Attucks High School jumped from 20 percent to 30 percent. The program was extended to George Washington High School beginning Fall, 1986. High school and existing college faculty teach in the program.

RADCLIFFE SUMMER PROGRAM IN SCIENCE

A Joint Project of Radcliffe College
and the Harvard Summer School
Radcliffe College
10 Garden Street
Cambridge, Massachusetts 02138
(617) 495-8626

This jointly-sponsored program offers young women, who have completed the junior or senior year of high school, opportunities to pursue their interests in math and science. The program runs on the same schedule as the Harvard Summer School.

Students are required to enroll for two courses, each of which carries four units of college-level credit. Through coursework, students examine the role of science in society, intellectual developments that link scientific knowledge, and the social and political consequences of scientific developments.

Students participate in Career Conversation Programs, in which women scientists discuss various aspects of their professional lives. Visits to Boston area research facilities, laboratories, and industrial sites are a part of the curriculum.

Admission is competitive and the number of openings for participants in the program limited. Thus, early application is advised.

SUMMER HEALTH CAREERS ACADEMIC ENRICHMENT PROGRAM

Howard University
Center for Preprofessional Education
Box 1124
Washington, DC 20059
(202) 636-7232

Howard University's pre-freshman program provides five weeks of academic reinforcement that enhance students' preparation for the pre-professional program. Instruction is offered in learning skills, problem solving, exam preparation in English, and mathematics. Course work in college biology, chemistry and physics as well as an introduction to the health professions also is offered.

The program is open to freshman students who have been admitted to Howard University for the Fall semester in pre-professional health curricula.

This program is supported partially by a grant from the U. S. Department of Health and Human Services. Travel assistance, university housing and a meal plan are provided at cost for a limited number of participants.

SUMMER SCIENCE ACADEMY

Northeast Resource Center for Science and Engineering at City College
New York, NY 10031
(212) 690-8300

The Summer Science Academy offers enrichment classes in mathematics, computing, analytical reasoning, physics, psychology and laboratory techniques.

Eighty students who are at least high school juniors participate in the four-week long summer program. The academy has existed for six years and is sponsored by City College, The State of New York, The National Science Foundation, and private donors. A $300 stipend is provided each participant.

Academic Persistence

LULA BELL STEWART CENTER
for Young Parents

1534 Webb Avenue
Detroit, Michigan 48206
(313) 867-2372

The Lula Bell Stewart Center opened in 1972 to provide health, prenatal, counseling, education, employment, and parent-training services to young, low-income, single, and expectant mothers up to age 21, the fathers of their babies, and the families of both.

The center functions as a community outreach program with services provided through home visits as well as office contacts. Services include individual, family, and group counseling. The program has a strong coordination and referral component that enables participants to obtain prenatal and other medical care that includes well-baby care, housing, daycare, employment job training, financial assistance, and continuing education.

Group activities are provided at the center in order to promote self awareness, increase parenting skills, develop self-direction and education in areas of everyday living. Parenting skills courses provide young parents with skills necessary to nurture and rear children, and offer information on nutrition, meal preparation, child care, and development.

In the area of continuing education, an alternative education program is operative at the center through cooperation with the Detroit Board of Education.

A foster care program for teen-age mother and baby together and a protective service program are offered for teen-age parents who may have come to the attention of Juvenile Court or the Department of Social Services.

The Delaying Early Sexual Involvement Program (DESIP) intervenes with siblings of the center's teen parents and their parents. Sessions stress communication and utilize peer counselors and a social worker.

The center also sponsors a Mother and Infant (MAI) House that serves as a shared living facility for six mothers and infants. This service provides a bridge for young parents prior to establishing independent living.

A Positive Parenting Project initiated in 1985 makes possible an intensive approach to parent education designed to prevent child abuse and neglect. The project has been cited as a model prevention effort by the Michigan Children's Trust Fund and at the Children's Defense Fund's Adolescent Speak-Out in Washington, D.C. in February, 1986.

An adjunct to the Positive Parenting Project is a grandparent support group. The aim is to link and share philosophy, information and values taught to teen parents in the parenting group. Grandparent meetings also enable these significant people opportunities to decrease social isolation, increase their knowledge of childhood and adolescent development and strengthen their capacity for problem solving. This group is co-facilitated by a social worker and the parenting skills instructor.

Young fathers are served in all of the programs and services. Also, they receive counseling services, on the job training, career planning, and possible educational and employment opportunities.

An advisory council, composed of clients and ex-users of services, provide valuable input to the center's program and design, as well as to legislative matters that may affect teenage parents. The center's staff is composed of administrators, social workers, para-professionals, child care workers with professional backgrounds, students and support staff. Area graduate students are placed at the center through Wayne State University for student worker practicum and intern experiences.

The center's 1986 Annual Report reflects an annual budget slightly over $1 million. A variety of services were provided to 514 clients during 1986. The center is funded through such public agencies as the Michigan Department of Social Services, the Michigan Department of Education, the Wayne County Job Training Partnership Agency, the United Foundation, and private organizations, and individual contributors.

GENERATIONAL EDUCATIONAL EQUITY PROGRAM (GEEP)

Wayne Miner Educational Program
Pioneer Community College
1940 E 11th Street
Kansas City, Missouri 64106
(816) 421-1849

The GEEP Program represents efforts to intervene in the cycle of poverty and welfare dependency with mother–daughter and other relational pairings of minority female welfare recipients. The program is designed to encourage and increase re-entry rates into the educational system. Assistance and training in vocational and job placement skills and instruction in general life management and survival skills are provided.

Sponsored by a metropolitan community college, the program is located on site at a public housing development unit. Minority female residents in three other public housing units in the metropolitan area are eligible for participation in the program as well. The program offers a variety of educational services, including but not limited to: basic skills classes in math, reading and language; preparation for GED examinations and counseling services; individual tutoring, survival/coping skills workshops and sessions on effective parenting, career planning, money management and interviewing. Classes are Monday–Friday from 9 a.m. to 3 p.m.

The program is staffed by an administrator, instructional faculty and a counselor. Pioneer Community College faculty and instructional staff from the University of Missouri/Kansas City Extension Program assist with presenting workshops.

LADY PITTS—SCHOOL AGE PARENTS PROGRAM

Lincoln Downtown Educational Center
Milwaukee Public Schools
820 E Knapp Street, 3rd Floor
Milwaukee, Wisconsin 53202
(414) 278-0401

Lady Pitts was established in the late 1960s through the efforts of a group of concerned community citizens. These citizens worked to establish a school for pregnant girls, many of whom had been dropping out of high school. After three years as an experimental school, Lady Pitts Center was accepted as a unit of the Milwaukee Public School System.

Lady Pitts offers general education courses in grades six through twelve. All students take courses in perinatal health, parenting and career development planning.

The Center has services of instructional faculty, a psychologist, social workers, public health nurses and a guidance counselor. Supportive services are available to counsel the pregnant school-age girl, her parents, the school-age father and his parents regarding their educational rights and options, adjustments to the pregnancy and teen parenting. A referral source is available for other community resources.

Daycare services are provided on site by a local child development center for a limited number of infants. Toddler care is provided at another location.

Financial support for this program is through the Milwaukee Public School District and the State of Wisconsin. Volunteers are used in the program for on site needs and for assisting former students in continuing their education, securing employment and health services.

OPERATION RESCUE, BARDSTOWN

Bardstown Education Association
Bardstown Elementary School
420 North Fifth Street
Bardstown, Kentucky 40004
(502) 348-9051

The Bardstown project is a new, teacher-initiated effort for drop out prevention in a predominantly rural Kentucky community. Directed by a school counselor in the high school, the program focuses on a collaborative community approach to provide work experience and vocational education, tutoring in the basics, and counseling support services to at-risk students in grades six through ten.

Counseling emphasizes building self-esteem, interpersonal relationships and basic social skills. There is a strong parent component emphasizing parent outreach and involvement of major community organizations and leaders working with the schools.

OPERATION RESCUE, SAN ANTONIO

San Antonio Teachers Council
120 Adams Street
San Antonio, Texas 78210
(512) 225-7174

This NEA Operation Rescue Grant expands teacher leadership in extending a program of the San Antonio Youth Literacy Project and the San Antonio Independent School District high schools. The program operates in three high schools. At-risk students are selected for an intensive "Literacy Leadership" summer program; they acquire technical skills using sophisticated video equipment and, by application, develop communication skills leading to greater self confidence and enhanced self-image.

Throughout the school year, student "Literacy Leaders" act as peer tutors for other students in remedial classes and the humanities/media arts program. A leadership team of teachers and community leaders develop, encourage, and oversee the participation of students in original media projects.

Teacher training, and strong community involvement and parent participation are major components of the program.

TEEN OUTREACH PROGRAM

Teen Outreach Replication Project
8346 Delcrest
St. Louis, Missouri 63124
(314) 872-1960

Teen Outreach was started in the St. Louis Public Schools in 1978. It is a classroom and community-based program to help participants develop self esteem. The project has two measurable goals: 1) reducing the number of teenage pregnancies and 2) increasing the number of high school graduates.

The project uses a holistic approach towards teaching both boys and girls how to make choices and set goals in their lives. A trained facilitator leads the peer support group through a detailed curriculum that focuses on such life skills as communication, decision making, problem solving, and identification of values.

Each student is expected to spend a specific number of hours per semester at a volunteer activity. This acquaints them with their communities, gives them work experience, and enhances self image.

The project is offered on several levels: 1) as a primary pregnancy prevention program; 2) as a high school drop out prevention program; 3) as a career exploration program; and 4) as an enrichment program for the middle students.

This project was started by the St. Louis Junior League and the Danforth Foundation. In 1984, the Charles Stewart Mott Foundation funded a national replication of the Teen Outreach Program. From the original seven programs, Teen Outreach has expanded to a network of 24 programs in 15 cities in 10 states and Canada. At the end of the 1984–85 year, ten percent of the comparison students, but only 3.4 percent of the Teen Outreach participants became pregnant during the school year. Teen Outreach also had a significant negative effect on course failure during the year of the program.

QUEENS TEEN PREGNANCY NETWORK, INC.

8931 161st Street
Jamaica, New York 11432
(718) 523-4476

The Queens Teen Pregnancy Network provides information and referral services to adolescent pregnant and parenting teens, parents of teens, interested citizens and other social service agencies. The network provides speakers for community groups, schools, civic organizations, and others who wish to learn about and become involved with efforts to reduce teen pregnancies. Monthly educational forums, monthly meetings, and a newsletter serve as primary vehicles for sharing information and resources.

Funding is provided through the New York Youth Bureau and State Division for Youth.

OPERATION RESCUE ON-SITE DAY CARE CENTER

Memphis Education Association
126 South Flicker Street
Memphis, Tennessee 38104
(901) 454-0966

This program was designed by local teachers as one of the NEA Operation Rescue grants. It presents a two fold attack on the drop out problem among high school students who are parents and these students' children. The program is designed to demonstrate short-range results by providing needed child care services to high school students who are parents and, thereby, to reduce their risk of dropping out.

The program also established the foundation for long-term drop out prevention by providing early childhood education to the teenager's infant and toddler children. Teen parents are taught parenting skills and activities that enhance the cognitive, sensory-motor, language and emotional development of their children.

The Memphis Education Association has developed extensive school and community collaboration for referral to appropriate social and medical services as needed.

CONTINUING EDUCATION FOR GIRLS

Detroit Public Schools
2200 Ewald Circle
Detroit, Michigan
(313) 252-3048

Continuing Education for Girls was initiated in 1966 as a pilot project designed to help meet the academic and emotional needs of pregnant teens, school-age parents and their children. The Program serves as a comprehensive and integrated model for Michigan. An additional 80 such programs are now approved and accredited by the Michigan State Board of Education.

The organization of the program is that of a secondary school for pregnant girls. It operates on the same schedule and under regulations of the regular school program. Free summer school is held 4 1/2 hours daily. Approximately 150 Chapter One-designated students are served at a time with an average of 300–350 students served in a year.

Service components include an educational schedule of daily instructional classes taught by certified teachers; health services including health counseling; referral and thorough follow-up for the delivery of medical assistance; mental health support and social services that focus on personal relationships, family problems, and on the identification of community resources. Students also participate in activities related to career planning and options available after graduation, including information about college and vocational skills.

Homebound Teachers visit students who have delivered their babies to provide instruction, bring assignments, etc., to help them keep up with classes. Students are encouraged to return to school as soon as possible after delivery.

The Infant Development Center was opened in 1982 for service to infants of Continuing Education students. Infants from 2 1/2 weeks old to 20 months are eligible to use the daycare program. Each mother is required to visit the day care center during her lunch break and perform any activities as needed.

Follow-up social services are provided to those students who return to regular school or graduate. Group, family and individual counseling is provided.

Numerous Detroit area agencies cooperate with the Detroit Public Schools in implementing the project.

BROOKLYN TEEN PREGNANCY NETWORK

30 Third Avenue
Brooklyn, New York 11217
(718) 855-4491 or 4492

The Brooklyn Teen Pregnancy Network is a nonprofit organization that facilitates communication and coordinates service delivery among agencies serving Brooklyn's pregnant, parenting, and at-risk females. The Network currently has a membership of 150 service providers and individuals.

Funding for the agency is received through the New York State Department of Social Services, New York City Youth Bureau, Chase Manhattan and New York Community Trust Banks.

ADULT CENTER OF EDUCATION (ACE)

Urban League of Greater Hartford
1229 Albany Avenue
Hartford, Connecticut 06112
(203) 527-0147

ACE is a comprehensive program designed to provide Hartford area high school drop outs with educational services. In addition, ACE addresses the education, job training and employment needs of high school graduates who need to "brush up" on basic academic skills. Since opening in 1980, nearly 450 students have graduated with GED diplomas. Approximately 80 percent of the graduates have been Black females.

The program operates on a tri-cycle system with each cycle lasting 13 weeks. The GED test is administered at the end of each cycle. Classes for GED preparation are offered in writing skills, social studies, science, reading skills and mathematics. In addition to the academic program, training and instruction are provided in life skills and job readiness. ACE has a higher than average rate for the GED with 80–85 percent of students passing it.

Other program services include assessment and placement testing; counseling, tutoring and career and job development assistance. A referral program exists for students needing assistance with health, housing and other needs. Transportation assistance with daycare, and other support services are given in order to facilitate student attendance.

In implementing this program, the Greater Hartford Urban League is supported by United Way, City of Hartford, Connecticut State Department of Education, and the Hartford Foundation for Public Giving.

TEEN PREGNANCY REDUCTION NETWORK

Office of Health Education
South Carolina Department of Health and Environmental Control
2600 Bull Street
Columbia, South Carolina 29201
(803) 734-4785

The Teen Pregnancy Reduction Network represents a good example of wide reaching, collaborative efforts between concerned citizens and religious, social service, civil, political, public service, and governmental agencies.

Technical assistance and consultation services are available for groups desiring to start new program initiatives to address teen pregnancy. Through quarterly meetings with representatives of member organizations and quarterly newsletters, members are provided information about services, and sharing of projects and programs.

Network activities, which include public awareness programs, are funded through member organizations.

STEPPING STONE PROGRAM

Teenage Parent Council of Austin, Inc.
2800 Webberville Rd., #109
Austin, Texas 78702
(512) 473-8825

Stepping Stone is a demonstration drop out prevention program in the Austin Independent School District. The program targets pregnant or parenting students age 14–17 who are at risk of dropping out of school. Male and female students who are not already receiving services through the district's Teenage Parent Program or Infant Development Center are eligible for services.

Each student is matched with a trained adult volunteer who serves as a case manager, advocate, and role model for the student. The case manager provides emotional support to the student and helps her/him locate and utilize existing school and community resources.

The Teenage Parent Council sponsors this program in partnership with the Hogg Foundation. Other activities and projects offered by the Council include:

Lunchtime Seminar Series: A series of one-hour seminars open to the general public that attempt to offer new insight into the complex problems associated with teen pregnancy and early parenthood.

The Green Book: A directory of resources for teens, pregnant teens and teen parents. The directory also is used by local health and social service professionals and by educators who work with teens.

Adolescent Pregnancy Child Watch: A study funded by an IBM community-service grant on the scope of teen pregnancy in Austin, which assessed the extent of services available for prevention of too early pregnancy, as well as the services for teens who are already parents. This collaborative effort involved seven local organizations. Task forces are being formed to address the needs identified by the study so that a comprehensive plan can be developed to address the problem of teen pregnancy.

Information Clearinghouse Services: Teenage Parent Council serves as a broker in the exchange of information, statistics, and audio-visual materials among agencies that work with pregnant teens/ teenage parents. A telephone information and referral service is available for pregnant and parenting teens.

Technical Assistance: To avoid gaps in or duplication of services, the council coordinates and shares activities of area agencies serving pregnant teens and teen parents.

Council activities are supported by the Communities in Schools Program, grants, private donations, and foundations. Two full-time staff are assisted by three interns.

Personal/Social Development

BLACK FAMILY PRESERVATION PROJECT

Kansas Children's Service League
Black Adoption Program
P.O. Box 1308
Kansas City, Kansas 66117
(913) 621-2016

The Black Family Preservation Project, a school/community based model program, was initiated by the Kansas Children's Service League in the Fall of 1984 under the leadership and funding of the Kansas Department of Health and Environment. The program is designed to address the high rate of early childbearing among young, Black females in Wyandotte county, and long range concerns for the structure of the Black Family. The overall goal of this program is to preserve and strengthen Black families by decreasing the incidence of pregnancy among young, single, Black women in Wyandotte county.

Northwest Middle School in Kansas City, Kansas is the setting for the model program. Northwest is a middle school in Northeast Kansas City with a majority Black student population. A school planning committee appointed by the principal to participate in the Black Family Preservation Project developed a profile of the school, students and families of Northwest. This profile set priorities and provided guidance for structuring the program. A faculty leadership team was appointed to work with the KCSL staff in implementing the program. Staff are assisted by a host of community volunteers.

Five-hundred students are provided services through one or more of the seven different program strategies. The strategies are as follows:

Teen Action Lab
Alpha Project
Forum for Parents
Mother/Daughter Action Lab
Career Day Lab
Mini-Labs
Self Concept Groups/Career Club

Teen Action Labs are based on the premise that youth have a superficial awareness of the effects of pregnancy upon their lives and futures. The workshops are designed to educate youth about the emotional, physical and social consequences of early sexual involvement; human reproduction and sexuality; the place of decision making in sexual behavior; love, romance and sex, and what to do about these feelings; self-esteem and its effect upon our behavior. Also, the labs include discussions on male/female roles and responsibilities in sexual behavior, recreational, educational and personal growth activities in the community and the importance of health and nutrition.

The Alpha Project is a one-day seminar conducted by members of the Alpha Phi Alpha Fraternity and project staff for young, Black males (13 to 19 years of age) who are teen fathers or potential teen fathers. The content of the seminars includes male responsibilities, male–female sex roles, consequences of teenage parenthood, personal and career options. The fraternity assists in primary planning for the seminars, such as location, selection of group facilitators and presenters and development of the seminar content.

The Parent Forum is based on the premise that parents must raise youth in a media atmosphere where sex is treated as a right rather than a responsibility. Therefore, parents are provided support from the community to counteract media messages, peer pressure and other influences that encourage young people to become sexually active. The Forum also allows parents an opportunity to work on implementing other program strategies.

Mother/Daughter Action Labs are focused on issues of female sexuality and parenting with a goal of improved and enhanced communication between mother and daughter.

Career Day Labs provide information on pre-employment skills, career choices, educational requirements for high school graduation and college enrollment and matriculation.

Mini Labs are conducted through the Teachers Advisory Program at Northwest. All youth in the school have an opportunity to participate in these labs. The mini-labs highlight the consequences of early sexual activity.

Self Concept Groups are small gatherings of youth that meet regularly to consider in more depth the values and goals that will guide their decisions as young adults. The groups are facilitated by staff and trained volunteers. The content of the group sessions is developed by the agency staff.

Career Clubs concentrate on career development in areas of interest to the students. Each group is enabled to take on small projects that reinforce positive alternatives to early sexual activity. For example, groups invite professionals or community leaders to present at meetings, take field trips and other career related activities.

The ambassador component of the program is for training a knowledgeable group of community people who can continue to carry the message of the Black Family Preservation Project. Their efforts increase the knowledge base of the community regarding teenage pregnancy. They also serve as positive role models for Black youth. Ambassadors promote community awareness of teen pregnancy issues and prevention strategies by meeting with Parent/Teacher organizations, church groups, sororities, fraternities, and other neighborhood associations, businesses and agencies.

By initiating this model school community project, the KCSL expects to replicate the program in other Kansas cities with high incidences of Black teenage pregnancy. Technical assistance and an evaluation and training component are directed by the principal investigator, Dr. Jacob Gordon of the University of Kansas. The current findings suggest positive results with participation rates remaining high in the second year of implementation. Decreased incidences of pregnancies are being noted, compared to previous years.

The Kansas Children's Service League is governed by a 39 member Board of Directors. The central administrative offices of the agency are located in Wichita, Kansas. Direct service programs, such as the Black Family Preservation Project are provided through district offices.

INFANT/CHILD/PARENT (ICP) DEVELOPMENT PROJECT

Neighborhood Centers, Inc. and
Texas Southern University
P.O. Box 88067
3401 Fannin
Houston, Texas 77288
(713) 527-7425

The Infant/Child Parent Development Project is designed to provide services to pregnant and parenting teenagers in the greater Houston area. Males and family members are encouraged to participate in the project's services. Also, the project serves as an information/referral source that gathers and disseminates information to other agencies in the Houston area that serve adolescents.

The project has a four-tiered approach designed to provide support services, including individual and group counseling, child development, parent education and family management workshops, linkages with existing community resources, and career development activities for adolescent mothers.

The Infant/Child/Parent Development Project is a cooperative effort between Texas Southern University, and Neighborhood Centers, Inc. The project is funded by the United Way, J.C. Penney Corporation, The MCA Shan Foundation, and other private sources.

MOTHER-DAUGHTER-SISTER SEMINAR

Milwaukee Urban League
2802 W Wright
Milwaukee, Wisconsin 53202
(414) 374-5850

Focusing on personal growth issues for women and girls, the first Mother-Daughter-Sister Seminar was held in May, 1987. The seminar is expected to be repeated annually.

The seminar was designed to provide women and girls with tools to enhance family relationships and expectations of one another, to build self esteem, and to develop a sense of self-empowerment and efficacy.

Wisconsin area women were chosen to facilitate the presentations and discussions. In addition, they served as role models and shared their educational and occupational experiences with participants.

This program was supplemented with financing from the Anheuser Busch Company.

YOUTH AWARENESS PROJECT

The Sisterhood of Black Single Mothers
1360 Fulton St., Suite 423
Brooklyn, NY 11216
(718) 638-0413

The Youth Awareness Project is one of several support programs offered by the Sisterhood of Black Single Mothers. Youth 12–18 years old are provided support and enrichment activities such as counseling, career and leadership development, cultural activities, field trips and workshops that focus on the concerns of youth.

The Sisterhood was founded in 1973 and is a self-help organization comprised of Black women who are single parents. Objectives of the Sisterhood include: 1) developing a viable support system through which Black single mothers gain positive images of themselves and their ability to raise children; 2) serving as a link between Black single mothers and the institutions and individuals impacting on their family's lives (legislature, social workers, educators, landlords, etc.); 3) enabling Black families to be strengthened through advocacy and information, jobs, child development, education and health services.

Other programs offered through the Sisterhood include operation of The Kianga House, an 18-unit residence which provides a positive living environment for young mothers and their education. The young mothers are provided home management training, child development instruction, parenting skills and assistance with personal development.

The Sisterhood sponsors periodic seminars, workshops and a quarterly newsletter. Additionally, individual and group counseling is available for addressing family issues, such as parenting skills, improving family communication and survival skills training.

The Sisterhood's staff and youth groups produce and conduct a 45 minute call-in radio show once a month. This show features guests from social services agencies and community organizations of interest to the concerns of Black single mothers and their families.

Information dissemination, referrals and coalition building are an integral feature of the Sisterhood. Through these efforts, single mothers are able to strengthen their ability to properly advocate for their families in regard to jobs, education, and housing. Staff represents the Sisterhood by actively participating in a broad range of networks, coalitions, advisory and governing boards, and government appointed task forces and commissions.

The Sisterhood is funded through its fundraising activities, newsletter subscriptions, and membership dues, along with support from churches, foundations and state agencies.

WOMEN'S SERVICES CLINIC

1905 E Street SE
PCRC Building, Room 22N
Washington, DC 20003
(202) 727-0660

The Women's Services Clinic is one of seven outpatient treatment centers of the Department of Human Services. The program was created in 1972 when the need for a specialized service for addicted pregnant women became apparent due to its relationship to the high rate of infant mortality and morbidity.

The program provides comprehensive services to the addicted female who is pregnant or within child bearing age, with special emphasis on pregnancy. The program's goals include eliminating the use of illegal drugs, promoting the adoption of a positive life style, reducing the complications of pregnancy, providing preventive health and education and promoting general health care.

Services include complete medical exams (OB/GYN), psychological evaluations, a drug treatment program, individual counseling, health education and awareness programs and social assessment and referrals.

Career Exploration

FEMME

Females in Engineering
Methods, Motivation, Experience

The Center for Pre-College Programs
New Jersey Institute of Technology
323 High Street
Newark, New Jersey 07102
(201) 645-5063

FEMME is a four-week summer program directed toward girls in their early high school years. Twenty-five girls, 50 percent of whom are minority, are selected to participate in the program following completion of their ninth grade year of high school. Program activities are held from 9:30 a.m. to 4:00 p.m. each week day throughout the four-week session.

Major goals of the program include facilitating the entry of young women in careers related to math, the hard sciences, engineering and computer science. Since completing math and science courses in high school is a gateway to majoring in such curricula once in college, FEMME provides academic and vocational experiences designed to overcome teenage girls' apprehension about enrolling in rigorous math and science courses, both at the high school and college levels.

Classroom experiences are structured around the "doing" of science and math with participants exposed to laboratory experiences and projects requiring the demonstrating and proving of problems in math, deduction, logic and mechanical reasoning. Other academic experiences are based on lectures covering topics pertinent to scientific careers in highly technological fields. Slides, films, reading materials, computers and field trips also make up participatory experiences for the students. In addition to trips to industrial and scientific sites, students meet and interact with scientists and engineers who may later serve as role models. Counseling and career information sessions are held with participants, and they are assisted with identifying how their interests may be matched with a career in the sciences and engineering, and the academic preparation necessary for that career.

Parents are provided an opportunity to interact with the program staff through a Parent's Program held at the end of the session. Parents are provided an overview of the experiences students receive and are encouraged to support their daughters' academic and career plans. Parent and participant evaluations of the program reflect high regard for the program with the great majority perceiving that both their own and their daughter's expectations for the program were fulfilled.

Follow-up and evaluation methods include keeping in touch with the girls during their subsequent high school years, providing information and guidance and counseling activities as needed. Evaluations to date have shown that participants take four or more years of high school math and science and that 75 percent of the 1981 ninth grade group who entered college in 1984 enrolled in math and science majors.

This program represents a collaborative partnership between institutions of higher education, private industry such as Revlon and New Jersey Bell, and philanthropic foundations. Cost for the 1984 program was approximately $30 per student per day, although all activities were free for participants.

PROGRAM FOR ACCELERATION IN COMPUTER SCIENCE CAREERS

For Minority Students (PAC)

Educational Opportunity Fund (EOF) Department
Monmouth College
West Long Branch, New Jersey 07764
(201) 571-3462

PAC consists of two, 10-week sessions starting in the Fall and concluding in the Spring of the academic year. Weekly sessions are from 9–12 a.m. on Saturday on the campus of Monmouth College and are open to minority students in the seventh through eleventh grades. Registration is held in September.

Major goals of the program include complementing the student's formal education processes and providing role models of minority professionals in high tech fields. Objectives include increasing student participants' awareness of computer science job opportunities and career paths and demonstrating the increasing relevance of computer science to society.

The program has three areas of concentration: developing and strengthening basic mathematics skills and introducing the types of math required for understanding computer science; establishing computer literacy and providing hands-on experience with computers; providing academic tutoring and counseling to enhance academic performance, sense of self, and opportunities for interacting with role models.

PAC represents a collaborative effort between the college, parents, volunteer staff, and a community organization. The program has a board of directors that sets policies, instructors who provide lecturing and counseling activities, volunteer support staff and a parent's council. Funding is through the college's educational Opportunity Fund Department, and the Asbury Park–Neptune Alumni Chapter of Kappa Alpha Psi Fraternity, Inc.

HIGH SCHOOL HEALTH CAREERS SUMMER PROGRAM

Office of Minority Affairs
University of Massachusetts, Medical Center
55 Lake Avenue North
Worcester, MA 01605
(617) 856-5543 or 2444

The University of Massachusetts' High School Health Careers Summer Program is a six-week program designed for underrepresented minority/ disadvantaged high school students who have completed the sophomore year and who are interested in the health professions.

Participants explore health careers through work and study at the University's medical center. Science classes, problem solving, writing and public speaking are offered to participants. Students work in laboratories, and attend seminars and workshops given by health professionals. A stipend is provided participants to help with expenses.

THE DISCOVERY PROGRAM

A Pre-College Academic Enrichment and Apprenticeship Program in Science and Technology

Rutgers/Cook College
The State University of New Jersey
New Brunswick, New Jersey 08903
(201) 932-9465

The Discovery Program is a comprehensive six-week summer program for 50 minority high school juniors and seniors. Approximately 20 participants are Black females. One of the program's main goals is to provide students an introduction to careers in science and technology.

The Discovery Program includes faculty sponsored research apprenticeships as well as academic instruction in math, English, scientific methods and computer science. Apprenticeship opportunities at Cook College are available in biotechnology, the environmental and life sciences and agriculture. Other apprenticeships are offered through agricultural engineering, business economics, environmental science/chemistry, nutrition and plant pathology. Students receive a $750 stipend and room and board.

This project is a collaborative effort between Cook College, New Brunswick Public Schools, New Jersey Department of Higher Education, New Jersey Educational Opportunity Program, Rutgers' Center for Mathematics, Science and Computer Education and School of Graduate Education, the U.S. Department of Agriculture and the U.S. Environmental Protection Agency.

ENGINEERING SUMMER PROGRAM

For Minority High School Students

The Minorities Program
College of Engineering
Rm 23 General Engineering Building
University of Wisconsin–Madison
Madison, Wisconsin 53706
(608) 262-7764

ESP is an eight-week summer program designed to give 40 minority high school students and recent graduates a chance to explore career opportunities in engineering and help them prepare for college.

The mathematics, science and engineering departments offer instruction in several science areas including computer science, and in communications and study skills. Students' course selections are individualized and based on standardized test results. The sessions include hands on laboratory experiences, interactions with engineering faculty and industry representatives and field trips.

Evaluations of the program indicate that students return to their high schools able to take more advanced courses and most improve their grade point average and class rank. Students also learn early what will be expected of them in college.

Funding for the program represents a collaborative effort between private industry and the university.

PROJECT OPPORTUNITY

An Institute to Promote Science, Math and Health Career Preparation for Minority High School Students in Central Illinois

Bradley University
Peoria, Illinois 61625
(309) 677-1000

Project Opportunity is a supplemental educational experience designed to expose Black and Hispanic high school students in Central Illinois to university life and study. Approximately 30 students, high school sophomores and juniors participate in the program. During 1986–87, 20 of the 30 students were Black females.

Students study mathematics, biology, chemistry, physics, and computer usage. Educational experiences are complemented with career exploration in related disciplines. In addition to developing study skills, the students learn time management and how to set realistic goals.

This project represents collaborative efforts between Bradley University, Illinois Central College, and The Tri-County Urban League. Class sessions are held at Bradley University and Central College campuses. Transportation is provided for students to class sessions and field trips. Participants receive a five dollar stipend for each Saturday session, $200 for the two-week summer session, free room and board and instructional materials and tutoring services. The academic year is October 1 to May 31.

TENNESSEE MINORITY HEALTH CAREERS PROGRAM

The Health Science Center
The University of Tennessee–Memphis
8 South Dunlap Street
Memphis, Tennessee 38163
(901) 528-6412

The Tennessee Minority Health Careers Program is a six and a half-week summer program on the UT–Memphis campus designed to aid talented minority high school sophomores, juniors, and seniors who are interested in pursuing health careers. Additionally, students are familiarized with a wide range of educational opportunities at the University of Tennessee–Memphis campus. Approximately 65 percent of the participants are Black females.

Enrichment areas offered to the pre-collegiate students are academic instruction in learning skills and the sciences, and career awareness activities. Students are involved in a series of lectures, discussions and laboratory experiences conducted by experienced high school and college faculty. The goals of the academic activities are to reinforce and enrich academic foundations to ensure future success and to enable students to integrate learning skills development into course content.

Opportunities to interact with minority health professionals and receive counseling on course selections and career requirements are stressed throughout the career awareness component. Also, Parents Open House is held to enable project faculty to meet with parents and discuss individual progress. Parents get an overview of the activities and purposes of the summer program.

There is no charge for tuition or admission to the summer program. All textbooks, laboratory materials and room and board in a campus residence hall are provided.

The Tennessee Minority Health Careers Program was established in 1984 by the Association of Memphis Colleges and Universities. Funding is through Shelby County, City of Memphis, and State of Tennessee.

Employment

CAREER BEGINNINGS PROGRAM—INDIANAPOLIS

Butler University
4600 Sunset Avenue
Jordan Hall, Room 85
Indianapolis, Indiana 46208
(317) 283-9398

The Career Beginnings Program, a college–business initiative started in 1986, is designed to help high school juniors from low-income families strengthen their chance to graduate from high school and obtain a full-time job or gain admission to college. During its first year, the Indianapolis program served 104 students from nine area high schools; 91 were Black and 71 were female.

The program, sponsored by the John D. and Catherine T. MacArthur Foundation, the Gannett Foundation, The Commonwealth Fund, and several other foundations, is managed by the Center for Human Resources at Brandeis University.

Specific goals of the program are for participants to:

complete six-week paid summer jobs and weekly workshops on job skills and the college application process;

finish their final year of high school;

attend a college or other program of post-secondary education or obtain a high quality, full-time job after high school graduation

Another long-range goal of the program is to trigger America's private sector to take the initiative to establish a nationwide system that can help thousands of young people whose potential otherwise will be undeveloped.

Starting in ten U.S. cities, the program builds on the lessons of the Job Corps, the Summer Youth Employment Program, the Job Training Partnership Act (JTPA), and the Career Explorations Program in New York City conducted by Hunter College and the Coalition of 100 Black Women.

Each college or university receiving a Commonwealth Fund Grant to initiate a Career Beginnings Program is expected to develop and operate the program to serve 100 low income high school juniors each year for two years.

Each institution in the Career Beginnings Program will receive a grant of as much as $100,000 from The Commonwealth Fund to support the development and the two-year operation of the program. Technical assistance is provided each grantee. To be eligible for a grant, cities must have a population greater than 100,000 (as reported in the U.S. Bureau of the Census Population Report, P-25, No. 976, October 1985).

Each program must have these four major components:

Mentor Program: Cooperating business/professional groups such as Private Industry Councils will recruit individuals from within their ranks to be assigned as one-to-one student mentors. Mentors will take responsibility for helping an assigned student find a summer job and a part-time job during the year. Additionally, they will help the student finish high school and gain admission to a college or obtain an entry-level job with career potential.

Job Skills and College Application Program: The college will devote one day a week of the summer program to a required workshop where students learn basic skills for finding a job, applying for it and meeting the expectations of an employer. Pre- and post-testing of students will help assess changes in knowledge and skills.

Quality Summer Work Experiences: The college will work with the local Private Industry Council or other private business/professional groups to provide students with well supervised, six-week summer jobs.

Year-Long Support Services: During the students' senior year, following the summer program, the participating college will offer the mentor and student continuing support services. These will include help in finding part-time jobs, obtaining college application materials, tutoring for academic deficiencies and, where necessary, referrals for psychological counseling, medical care and family planning programs.

Curriculum

BEYOND THE STEREOTYPES: A GUIDE TO RESOURCES FOR BLACK GIRLS AND YOUNG WOMEN

National Black Child Development Institute (NBCDI)
1463 Rhode Island Avenue, NW
Washington, D.C. 20005
(202) 387-1281

This resource guide is aimed toward counteracting stereotypic images of Black girls and women in children's educational materials and the media. Resources, including books, records and cassettes, films and video tapes, are grouped according to appropriateness of use with four age groups—3 to 7 years, 8 to 11 years, 12 to 15 years and for young women age 16 and older.

The guide also contains a section on criteria for selecting resources for Black girls with suggestions for how the material might be used by a parent or family member, teacher or librarian, members of community or church groups and helping professionals.

An advisory committee assisted with the development of the guide, and funding was received through a grant from the Women's Educational Equity Act Program.

FAMILY MATH

Lawrence Hall of Science
University of California–Berkeley
Berkeley, California 94720
(415) 642-3167

Family Math focuses on parents and children learning mathematics together. A typical Family Math course includes six or eight sessions of an hour or two and gives parents and children (kindergarten through eighth grade) opportunities to develop problem solving skills and to build an understanding of mathematics with "hands-on" materials.

Courses are taught by grouped grade levels such as K–3, 4–6, or 6–8. Parents in Family Math classes are also given the mathematics topics at their childrens' grade level and explanations of how these topics relate to each other. Materials for each course are based on the school mathematics program for those grade levels and reinforce the concepts that are introduced throughout the curriculum.

To ensure that the reason for studying mathematics is clear, men and women working in math-based occupations come to Family Math classes to talk about how math is used in their jobs.

The course runs for 4 to 8 weeks with once a week classes that last one to two hours, usually in the evening. Teachers of Family Math courses may be the classroom teacher, a parent, a teacher-aide, community college instructor or a retired person.

A grant from the Fund for the Improvement of Post Secondary Education (U.S. Department of Education) provided the initial funds for the program. More than 600 family math courses have been taught to 15,000 parents and their children, throughout the country, since inception of the program.

LIFE STYLES

Education and Counseling Program
1221 West Lakeview Avenue
Pensacola, Florida 32501
(904) 432-1222

Life Styles is a curriculum-based project that addresses specific developmental tasks of adolescents. The curriculum has been used extensively with students, parents, church youth groups and with adolescent residential programs.

Persons using the curriculum are encouraged to choose age appropriate sessions and adapt them to the needs of their student population. Since inception of the program in 1977, Black females have made up approximately 25 percent of the population served.

Topical areas included in the curriculum are:

achieving new and more mature relations with age mates of both sexes;
achieving a masculine or feminine social role;
accepting one's physique and using the body effectively;
achieving emotional independence of parents and other adults;
achieving assurance of economic independency;
selecting and preparing for an occupation;
preparing for marriage and family life;
developing intellectual skills and concepts for civic competence;
desiring and achieving socially responsible behavior;
acquiring a set of values and an ethical system as a guide to behavior.

Other areas include rights and needs of children; methods of birth control; the emotional and financial costs of parenthood; effective communication; adolescent parenthood and acquiring values.

"JUST BETWEEN SISTERS: Futures Unlimited"
(A Multimedia Package)

Consortium for Educational Equity
Rutgers University–Kilmer Campus
New Brunswick, New Jersey 08903
(201) 932-2071

"Just Between Sisters" is a multi-media package consisting of ten posters, a videotape and curriculum guide directed toward a group considered "at risk," minority teen aged girls in urban settings, especially those who may not have a variety of positive role models to inspire their career development. These students may be at the highest risk of being poor all their lives unless multiple and sound intervention strategies are developed and implemented.

This package is developed around the premise that seeing adults in various occupations increases acceptance of the occupations. Black and Hispanic women in nontraditional, technically oriented careers are profiled as role models. The curriculum guide is designed to provide realistic information on women's expected participation in the labor force and includes activities designed to expand their horizons and help improve their self esteem.

High school students are encouraged to pursue science and math based careers. Four minority women who are successful in nontraditional careers and whose career may not have followed an orderly or traditional path are profiled. These young women talk about their education and their jobs.

Developed by Bette Baranco Bland and Marylin A. Hulme and funded by the Women's Educational Equity Act Program, this package is available through the Consortium for Educational Equity at Rutgers.

PROJECT SEED, INC.

2336-A McKinley Avenue
Berkeley, California 94703
(415) 644-3422

Project Seed is a nationwide program in which professional mathematicians and scientists from major universities and research corporations teach abstract, conceptually oriented mathematics to full-sized elementary school classes of educationally disadvantaged children on a *daily* basis as a supplement to their regular arithmetic program. The mathematics is presented through use of a Socratic group discovery format in which children discover mathematical concepts by answering a sequence of questions posed by the Seed Instructor. Topics are chosen from high school and college algebra to reinforce and improve the students' computational skills and to help equip them for success in college-preparatory mathematics courses at the secondary level.

Project Seed was started in 1963 by its present director, William F. Johntz. The Project's long range goal is to increase significantly the number of minority and other educationally disadvantaged youth majoring in and attaining careers in mathematics and related fields. The Project seeks to raise the students' achievement level and self concept by providing them with success in a high status, abstract subject.

Project Seed is always offered as a supplement to, and never as a replacement of, the regular mathematics program. The regular classroom teacher is always present when the Seed Mathematician is working with her or his class. This enables the regular classroom teacher to enhance his/her knowledge of mathematics and develop more effective teaching methodologies. Teachers also acquire new and higher expectations for educationally disadvantaged children.

Major evaluations of the Seed Program demonstrate enormous success. The program is cost effective, and requires no expensive materials or gadgets. In-service teacher training program options are available for districts desiring to increase the level of achievement of educationally disadvantaged students.

Project Seed, Inc. is a non-profit, tax exempt corporation. Financial support for the Program comes from a variety of government grants, corporations and universities.

Staff Development

BAY AREA MATHEMATICS PROJECT (BAMP)

School of Education and Lawrence Hall of Science
University of California–Berkeley 94703
(415) 642-3167

The Bay Area Mathematics Project was established in the Spring of 1983 and has held annual summer institutes since then. The primary objectives of the institute are to provide mathematics educators with opportunities to share and improve their mathematics skills, instructional strategies and techniques for attracting and retaining underrepresented groups of students, as well as to prepare them for disseminating these strategies to their colleagues.

The project's goal is to build a network that enhances mathematics education by providing participants at all levels of education (K–12) with a continuing flow of information and ideas and a sense of community looking toward a common goal.

The program's academic year goal is to facilitate continuation of the participants' leadership role in mathematics education by helping them form a network that will include many teachers other than Institute participants; by providing seed money in the form of mini-grants for projects designed by teachers; and by offering on-going assistance for their continued professional development.

Participants attend a 16-day Summer Institute and monthly follow-up meetings of the Bay Area Mathematics Project. A stipend of $600 is awarded to participants who complete all requirements.

More than 170 teachers from 50 districts have participated in the project. They, in turn have been responsible for hundreds of workshops, providing thousands of teachers with new ideas and strategies for the teaching of mathematics. Many participants have become officers or committee members in local, state and national professional organizations that focus on mathematics education.

The project is funded by the California Mathematics Project and the Ford Foundation.

EQUALS

Lawrence Hall of Science
University of California–Berkley
Berkley, California 94720
(415) 642-3167

Equals is an in-service training program for educators who can, in turn, use the materials and strategies provided to promote the participation of women in mathematics and encourage their entrance into a wider range of careers. The training helps educators examine their expectations of girls and boys in mathematics and science classes. The training further assists educators in developing and adapting materials to increase student confidence and competence in the doing of mathematics and science. Finally, the training encourages educators to develop plans for incorporating career awareness into mathematics and science courses in order to increase students' awareness of opportunities for careers in the sciences.

Awareness, confidence and encouragement are three strands around which the program is based. Teachers and students are made *aware* of the need for mathematics and the options it opens for students; *confidence* is built by providing strategies for success in mathematics; encouragement involves *motivating* students to continue studying mathematics and to consider a wide variety of careers.

Participants are provided information on research issues related to women and mathematics. Strategies include helping females develop critical thinking and problem solving skills, and furnishes teachers and students with career information and activities that provide non-sexist information.

SHAPING TEACHER EXPECTATIONS FOR MINORITY GIRLS: A Teacher Training Module

Creative Learning, Inc.
3201 New Mexico Avenue, NW
Washington, DC 20016
(202) 966-3780

The Shaping Teacher Expectations for Minority Girls: Teacher Training Module was developed with a grant from the Womens' Educational Equity Act Program. The module is designed to help teachers convey expectations that lead to academic success. Consisting of three units that build upon the learning of the previous unit, the module covers research pertinent to raising teacher expectations and forming and communicating higher expectations for minority girls. Each unit contains 1) a content outline; 2) suggested steps for teaching the content; 3) opening exercises to introduce concepts and ideas; 4) resource information from which the trainer can develop lectures; 5) group activities to reinforce concepts introduced in the lecture; and; 6) exercises to help individual trainees gain a more in depth understanding of key concepts.

The units help teachers to identify examples of teacher expectations, examine how expectations influence educational progress, and sharpen skills in communicating clear, realistic expectations to students. Included, also, is an annotated bibliography of selected resources on race and sex bias in instructional materials, and career guidance for minority girls and background information on minority women.

THE BLACK FEMALE EXPERIENCE IN AMERICA

A Learning Teaching Guide

Edited by Joanna Allman, et al.
Education Development Center
39 Chapel Street
Newton, MA 02160
(617) 965-6325

The purpose of this document is to provide a guide for learning and teaching about the experiences of Black females in America. It stresses psychosocial issues in the development of Black females.

The guide is divided into four sections, each of which includes topical units. Section I is developed around "Understanding Sex Roles and Moving Beyond." An examination of sex-role stereotyping in American institutions and across cultures is presented. Suggested media are provided to supplement resource material in each of the sections.

Section II focuses on "Development Counseling and Career Issues—The Female Experience in America." It includes an overview of female development, women's career patterns, counseling approaches for women and critical incidents in female development. Section III, "The Black Female Experience in America," contains lessons on Black women in slavery, in the twentieth century and historical and contemporary role models. Counseling concerns for healthy development are presented. Section IV is devoted to an examination of issues pertaining to rural "Applachian Women."

90

Each section of the guide contains a lesson plan which includes an introduction, learning objectives, facilitator preparation, suggested learning activities, a bibliography and related media resources.

This guide was developed at the University of Tennessee, Department of Educational Psychology and Guidance. The lessons are more appropriate for integration within general women's studies courses, but can be useful for teacher training programs as well.

School Leadership

ACCELERATED SCHOOLS PROJECT: EMPOWERING CHILDREN FOR LEARNING

Center for Educational Research
School of Education
Stanford University
Stanford, California 94305
(415) 723-0840

The Accelerated Schools Project is a new initiative in two San Francisco Bay Area elementary schools that began in 1987. "A child will learn if he/she is expected to learn; a child will learn if he/she knows she can learn" are the fundamental ideas of the ASP.

The project is a school-wide intervention strategy focusing on one goal: to bring disadvantaged students up to grade level by the end of the sixth grade. To accomplish this, the Accelerated Schools Project seeks to empower not only the faculty, but also the students and their parents so that significantly greater learning occurs for all students.

In addition to clear goals and high expectations for students, parents and school staff, the project stresses cooperative learning, peer tutoring, regular homework assignments, and language across the curriculum with writing accentuated in all subjects. Problem-solving approaches are emphasized starting in the earliest grades.

Also, the project provides parental training and draws its teaching volunteers from senior citizens and college students.

The project stresses site-level management in which educators who are responsible for the school develop and implement the program.

This program is a collaborative effort between Stanford University and local educational agencies.

A FACT PACK FOR EDUCATORS

Single Parenting, Teenage Pregnancy and Poverty
Educational Equity Center
Los Angeles County Office of Education
9300 East Imperial Highway
Downey, California 90242
(213) 922-6911

That schools can do much to provide single parents, pregnant and parenting teenagers with the skills, information and help they need to be self sufficient is the main thesis of this fact pact. Designed for educators, it provides an overview of how demographics and the changing composition of families impacts female students.

Developed primarily to provide information for educators in the Los Angeles school district, strategies are presented for educators at different levels, for classroom teachers, building principals and district superintendents. Suggested action steps are included, as well as information on regional networks which address adolescent pregnancy.

MASTERY IN LEARNING PROJECT

National Education Association
1201 16th St. N.W.
Washington, D.C. 20036
(202) 822-7907

The Mastery in Learning Project is a school-based, school improvement effort. The Project is conducted in a network of twenty-seven cooperating schools that are demographically representative of American public schools. Several processes are used to bring about change and school reform. School faculties establish priorities based on their individual school needs. Four steps define the work in these schools.

School Profile: A description of the school, the academic program, instructional and learning styles and the conditions that influence learning and teaching. Through structured interviews, students, parents, teachers, the schools' administrative team and district officials provide the data for the profile.

Faculty Inventory: Designed to establish faculty priorities on teaching, learning, curriculum and the school's climate.

Empowering Faculty: Provide resources to address the faculty's priorities (research on teaching and learning, reports of good practice) and organizing to act on these priorities.

Restructuring the School: Preparing, evaluating, refining and implementing a school improvement plan that focuses on high, relevant standards for students.

A planning chart is made available for each of the participating schools. The chart lists the essential topics to consider in a reform effort. Resources used to work on these and other activities are provided through regional educational laboratories, data-based systems available to the school, NEA's professional library, a site-based consultant, local universities and from the faculty's collective experience.

Schools participating in the Mastery in Learning Project are provided funding through NEA and a variety of state and national as well as business and community sources. NEA officials stress that while mastery in learning materials can be used by schools not involved in the project, school reform is a complex process and faculties should have leadership, resources and careful assessment before embarking on such an improvement effort. Schools in the MIL Project have a special budget, a bank of substitute days from which to draw, a site-based consultant who commits approximately twenty hours per week to project work, support from regional educational laboratories and considerable support from the project's central office.

Strategies

STRATEGIES TO INCREASE THE ACADEMIC PERFORMANCE AND PERSISTENCE OF BLACK FEMALES

	PAGE NUMBER	STATE		ELEMENTARY SCHOOL	MIDDLE SCHOOL	HIGH SCHOOL	PRE-COLLEGE		ACADEMIC PERFORMANCE	ACADEMIC PERSISTENCE	PERSONAL/SOCIAL DEVELOPMENT	CAREER EXPLORATION	EMPLOYMENT		CURRICULUM	STAFF DEVELOPMENT	SCHOOL LEADERSHIP		UNIVERSITY/COLLEGE	LOCAL EDUCATION AGENCY	PARENTS	COMMUNITY ORGANIZATION	COMMUNITY AGENCY	NATIONAL ORGANIZATION	NON-PROFIT AGENCY		PUBLIC	CORPORATE	FOUNDATION	COMMUNITY AGENCY	UNIVERSITY
ACADEMICALLY INTERESTED MINORITIES (AIM)	[illegible]	MI				•			•	•									•						•					
ACADEMY OF SCIENCE AND MATHEMATICS	[illegible]	GA				•			•		•	•								•		•					•			
ACCELERATED SCHOOLS PROJECT	[illegible]	CA		•													•		•	•	•						•			•
ADULT CENTER OF EDUCATION (ACE)	[illegible]	CT				•				•	•	•	•		•									•			•		•	
BAY AREA MATHEMATICS PROJECT (BAMP)	[illegible]	CA		•	•	•	•								•	•			•									•		•
BEYOND THE STEREOTYPES: A GUIDE TO RESOURCES...	[illegible]	DC		•	•	•	•				•				•	•								•			•			
BLACK FAMILY PRESERVATION PROJECT	[illegible]	KS			•				•	•	•	•					•			•	•	•	•				•		•	
THE BLACK FEMALE EXPERIENCE IN AMERICA	[illegible]	MA				•	•				•	•			•	•			•								•			
BRIDGE PROGRAM	[illegible]	IN				•			•		•	•							•					•					•	•
BROOKLYN TEEN PREGNANCY NETWORK	[illegible]	NY			•	•				•												•	•		•		•	•	•	

STRATEGIES TO INCREASE THE ACADEMIC PERFORMANCE AND PERSISTENCE OF BLACK FEMALES

	PAGE NUMBER	STATE	ELEMENTARY SCHOOL	MIDDLE SCHOOL	HIGH SCHOOL	PRE-COLLEGE	ACADEMIC PERFORMANCE	ACADEMIC PERSISTENCE	PERSONAL/SOCIAL DEVELOPMENT	CAREER EXPLORATION	EMPLOYMENT	CURRICULUM	STAFF DEVELOPMENT	SCHOOL LEADERSHIP	UNIVERSITY/COLLEGE	LOCAL EDUCATION AGENCY	PARENTS	COMMUNITY ORGANIZATION	COMMUNITY AGENCY	NATIONAL ORGANIZATION	NON-PROFIT AGENCY	PUBLIC	CORPORATE	FOUNDATION	COMMUNITY AGENCY	UNIVERSITY
CAREER BEGINNINGS PROGRAM - INDIANAPOLIS	36	IN			•			•	•	•	•				•			•	•					•		•
CONTINUING EDUCATION FOR GIRLS	24	MI		•	•			•	•	•		•				•						•			•	
THE DISCOVERY PROGRAM	34	NJ			•		•			•					•	•						•				•
ENGINEERING SUMMER PROGRAM	34	WI			•	•	•	•		•		•			•								•			•
EQUALS	31	CA	•	•	•	•						•	•		•							•				•
A FACT PACK FOR EDUCATORS	43	CA		•	•							•	•	•		•						•				
FAMILY MATH	37	CA	•	•			•			•		•			•	•	•	•				•				•
FEMALES IN ENGINEERING (FEMME)	32	NJ			•		•		•	•					•								•	•		•
GENERATIONAL EDUCATIONAL EQUITY PROGRAM (GEEP)	20	MO			•			•	•	•	•				•		•		•			•				•
HIGH SCHOOL HEALTH CAREERS SUMMER PROGRAM	33	MA			•		•			•					•							•				•

STRATEGIES TO INCREASE THE ACADEMIC PERFORMANCE AND PERSISTENCE OF BLACK FEMALES

	PAGE NUMBER	STATE	ELEMENTARY SCHOOL	MIDDLE SCHOOL	HIGH SCHOOL	PRE-COLLEGE	ACADEMIC PERFORMANCE	ACADEMIC PERSISTENCE	PERSONAL/SOCIAL DEVELOPMENT	CAREER EXPLORATION	EMPLOYMENT	CURRICULUM	STAFF DEVELOPMENT	SCHOOL LEADERSHIP	UNIVERSITY/COLLEGE	LOCAL EDUCATION AGENCY	PARENTS	COMMUNITY ORGANIZATION	COMMUNITY AGENCY	NATIONAL ORGANIZATION	NON-PROFIT AGENCY	PUBLIC	CORPORATE	FOUNDATION	COMMUNITY AGENCY	UNIVERSITY
INFANT/CHILD/PARENT DEVELOPMENT PROJECT	29	TX			•				•						•						•	•	•			•
JUST BETWEEN SISTERS	38	NJ			•					•		•			•							•				•
LADY PITTS SCHOOL-AGE PARENTS PROGRAM	21	WI		•	•			•	•		•			•		•	•					•				
LIFESTYLES	38	FL		•	•	•			•			•					•	•			•					
LULA BELL STEWART CENTER	19	MI		•	•			•	•							•	•		•			•				
MASTERY IN LEARNING PROJECT	44	DC	•	•	•							•	•	•		•				•		•		•		
MATHEMATICS, ENGINEERING, SCIENCE ACHIEVEMENT (MESA)	16	CA			•		•			•		•		•			•				•			•		•
MID-AMERICA CONSORTIUM FOR ENGINEERING AND SCIENCE ACHIEVEMENT (MACESA)	13	KS NE MO			•	•	•		•	•					•	•				•			•			•
MINORITY ENGINEERS INDUSTRIAL OPPORTUNITY PROGRAM (MEIOP)	16	OH			•	•	•		•	•					•								•	•		•
MOTHER/DAUGHTER/SISTER SEMINAR	29	WI		•	•	•			•								•	•	•	•			•			

STRATEGIES TO INCREASE THE ACADEMIC PERFORMANCE AND PERSISTENCE OF BLACK FEMALES

	PAGE NUMBER	STATE	ELEMENTARY SCHOOL	MIDDLE SCHOOL	HIGH SCHOOL	PRE-COLLEGE	ACADEMIC PERFORMANCE	ACADEMIC PERSISTENCE	PERSONAL/SOCIAL DEVELOPMENT	CAREER EXPLORATION	EMPLOYMENT	CURRICULUM	STAFF DEVELOPMENT	SCHOOL LEADERSHIP	UNIVERSITY/COLLEGE	LOCAL EDUCATION AGENCY	PARENTS	COMMUNITY ORGANIZATION	COMMUNITY AGENCY	NATIONAL ORGANIZATION	NON-PROFIT AGENCY	PUBLIC	CORPORATE	FOUNDATION	COMMUNITY AGENCY	UNIVERSITY
NUPRIME	15	MA			•	•	•		•	•	•				•		•					•	•			•
OPERATION RESCUE, BARDSTOWN	21	KY		•	•			•	•		•	•				•	•	•	•	•		•		•		
OPERATION RESCUE ON-SITE DAY CARE CENTER	23	TN			•			•	•							•			•	•		•				
OPERATION RESCUE, SAN ANTONIO	22	TX			•			•	•				•			•	•	•	•	•		•		•		
PROGRAM FOR ACCELERATION IN COMPUTER SCIENCE CAREERS (PAC)	13	NJ		•	•		•		•	•					•		•	•		•						•
PROJECT OPPORTUNITY	25	IL			•		•		•	•					•				•						•	•
SPECIAL ELEMENTARY EDUCATION FOR THE DISADVANTAGED (SEED)	19	CA	•	•	•		•	•				•	•								•	•	•			•
QUEENS TEEN PREGNANCY NETWORK, INC.	23	NY		•	•			•	•								•	•	•		•	•				
RADCLIFFE SUMMER PROGRAM IN SCIENCE	12	MA			•		•			•		•			•											•
RECRUITMENT INTO ENGINEERING OF HIGH ABILITY MINORITY STUDENTS (REHAMS)	14	LA			•	•	•			•					•								•	•		•

STRATEGIES TO INCREASE THE ACADEMIC PERFORMANCE AND PERSISTENCE OF BLACK FEMALES

	PAGE NUMBER	STATE	ELEMENTARY SCHOOL	MIDDLE SCHOOL	HIGH SCHOOL	PRE-COLLEGE	ACADEMIC PERFORMANCE	ACADEMIC PERSISTENCE	PERSONAL/SOCIAL DEVELOPMENT	CAREER EXPLORATION	EMPLOYMENT	CURRICULUM	STAFF DEVELOPMENT	SCHOOL LEADERSHIP	UNIVERSITY/COLLEGE	LOCAL EDUCATION AGENCY	PARENTS	COMMUNITY ORGANIZATION	COMMUNITY AGENCY	NATIONAL ORGANIZATION	NON-PROFIT AGENCY		PUBLIC	CORPORATE	FOUNDATION	COMMUNITY AGENCY	UNIVERSITY
SHAPING TEACHER EXPECTATIONS FOR MINORITY GIRLS	11	DC	•	•	•	•	•		•			•			•	•					•		•				
STEPPING STONE PROGRAM	26	TX			•			•	•					•		•	•	•	•						•		
SUMMER BRIDGE PRE-COLLEGE ENGINEERING PROGRAM (PREP)	13	GA			•		•			•		•			•								•				•
SUMMER HEALTH CAREERS ENRICHMENT PROGRAM	14	DC			•		•			•					•								•				•
SUMMER SCIENCE ACADEMY	16	NY			•		•			•		•			•								•		•		•
TEEN OUTREACH PROGRAM	22	MO			•			•	•	•						•		•					•		•		
TEEN PREGNANCY REDUCTION NETWORK	25	SC		•	•			•								•		•	•		•		•			•	
TENNESSEE MINORITY HEALTH CAREERS PROGRAM	27	TN			•		•			•					•		•						•				•
YOUTH AWARENESS PROJECT	30	NY	•	•	•		•	•	•	•						•	•			•						•	
WOMEN'S SERVICES CLINIC	31	DC			•	•			•										•				•			•	

Bibliography

Alexander, K. L., & Eckland, B. K. (1974). Sex differences in the educational attainment process. *American Sociological Review, 39*, 668–682.

Allman, J., Scott, P. B., Hardin, M., & Lord, S. B. (1979). *The black female experience in America: A learning/teaching guide*. Nashville, TN: University of Tennessee Model Sex-Fair Program in Educational Psychology and Guidance. (ERIC Document Reproduction Service No. ED 186 573)

Amodeo, L., & Martin, J. (March, 1982). *A study of the effects of multicultural training on the factual knowledge and stereotypic attitudes of elementary and secondary teachers*. Paper presented at the Annual Meeting of the American Educational Research Association, New York, NY.

Anderson, K. (1980). Educational goals of male and female adolescents: The effects of parental characteristics and attitudes. *Youth and Society, 12*(2), 173–188.

Anick, C., Carpenter, T., & Smith, C. (1981). Minorities and mathematics: Results from the National Assessment of Educational Progress. *The Mathematics Teacher, 74*, 560–566.

Bailey, G., & Bailey, G. (1986). Teaching parents how to identify and use sex-equitable instructional materials. *Feminist Teacher, 2*(3).

Bank, B., Biddle, B., & Good, T. (1980). Sex roles, classroom instruction and reading achievement. *Journal of Educational Psychology, 72*(2), 119–132.

Banks, J. A. (1981). *Multiethnic education: Theory and practice*. Boston: Allyn and Bacon, Inc.

Bell, D. (Ed.). (1980). *Shades of brown: New perspectives on school desegregation*. New York: The Teachers College Press.

Bennet, C. (1979). Teaching students as they would be taught: The importance of cultural perspective. *Educational Leadership, 39*, 259–268.

Bennett, W. (1986). *First lessons: A report on elementary education in America*. Washington, DC: U.S. Government Printing Office.

Berkovitz, I. H., Carr, E., & Anderson, G. (1983). Attending to the emotional needs of junior high school students and staff during desegregation. In G. J. Powell, J. Yamamoto, A. Romero, & A. Morales (Eds.), *The psychosocial development of minority group children* (pp. 474–482). New York: Brunner/Mazel.

Berryman, C., & Schneider, D. O. (November, 1982). *Patterns of work experience among high school students: Educational implications*. Paper presented at the Annual Meeting of the National Council for the Social Studies, Boston, MA.

Berryman, S. E. (1980). *Vocational education and the work establishment of youth: Equity and effectiveness issues. A rand note*. Santa Monica, CA: Rand Corp.

Bickel, V. L. (1981). *Factors influencing the achievement of culturally different children*. South Bend, IN: Indiana University at South Bend. (ERIC Document Reproduction Service No. ED 201 560)

Biddle, B., Bank, B., & Marlin, M. (1980). Parental and peer influence on adolescents. *Social Forces, 58*(4), 1057–1079.

Borich, G. D., Kash, M. & Kemp, F. (1979). *What the teacher effectiveness research has to say about teaching practices and student performance*. (R & D Report No. 5069). Austin, TX: Texas University, Austin, Research and Development Center for Teacher Education. (ERIC Document Reproduction Service No. ED 189 077)

Bowler, R., Rauch, S., & Schwarzer, R. (1986). Self-esteem and interracial attitudes in black high school students: A comparison with five other ethnic groups. *Urban Education, 21*(1), 3–19.

Boykin, A. (1986). The triple quandary and the schooling of Afro-American children. In U. Neisser (Ed.), *The school achievement of minority children: New perspectives* (pp. 57–92). Hillsdale, NJ: Lawrence Erlbaum, Assos.

Braddock, J., Crain, R., & McPortland, J. (1984). A long-term view of school desegregation: Some recent studies of graduates as adults. *Phi Delta Kappan*, 259–264.

Britton, G., & Lumpkin, M. (1983). Basal readers: Paltry progress pervades. *Interracial Books for Children Bulletin, 14*(6), 4–7.

Brophy, J. (1981). Teacher praise, A functional analysis. *Review of Educational Research, 51*(1), 5–32.

Brophy, J. (1982). Successful teaching strategies for the inner-city child. *Phi Delta Kappan, 63*(8), 527–530.

Brophy, J. (1983). Research on self-fulfilling prophecy and teacher expectations. *Journal of Educational Psychology, 75*(5), 631–661.

Brophy, J. E., & Good, T. L. (1970). Teacher communication of differential expectations for children's classroom performance: Some behavioral data. *Journal of Educational Psychology, 61*(5), 365–374.

Brown, R. (1986). State responsibility for at-risk youth. *Metropolitan Education, 2*, 5–12.

Bryant, B. (1981). *Shaping teacher expectations for minority girls. A teacher training module*. Washington, DC: Creative Learning, Inc. (ERIC Document Reproduction Service No. ED 217 100)

Burlew, A. (1977). Career educational choices among black females. *Journal of Black Psychology, 39*(2), 88–106.

Campbell, P. (1986). What's a nice girl like you doing in a math class. *Phi Delta Kappan, 67*(7), 516–520.

Campbell, P. B. (1982). Research "findings": How accurate? *Interracial Books for Children's Bulletin, 13*(1), 12–14.

Carter, J. H. (1983). Vision or sight: Health concerns for Afro-American children. In G. J. Powell, J. Yamamoto, A. Romero, & A. Morales (Eds.), *The psychosocial development of minority group children* (pp. 13–25). New York: Brunner/Mazel.

Casserly, P. (1980). Factors affecting female participation in advanced placement programs in mathematics, chemistry and physics. In L. Fox, L. Brody & D. Tobin (Eds.), *Women and the mathematical mystique* (pp. 138–163). Baltimore: The Johns Hopkins Press.

Chester, N. (1983). Sex differentiation in two high school environments: Implications for career development among black adolescent females. *Journal of Social Isues, 39*(3), 29–40.

Children's Defense Fund. (1987). *Adolescent pregnancy: An anatomy of a social problem in search of comprehensive solutions*. Washington, DC: Author.

Children's Defense Fund. (1987). *Childcare: An essential service for teen parents*. Washington, DC: Author.

Children's Defense Fund. (1986). *Adolescent pregnancy, what the states are saying*. Washington, DC: Author.

Children's Defense Fund. (1986). *Adolescent pregnancy—whose problem is it?* Washington, DC: Author.

Children's Defense Fund. (1986). *Building health programs for teenagers*. Washington, DC: Author.

Children's Defense Fund. (1986). *Model programs: Preventing adolescent pregnancy and building youth self-sufficiency*. Washington, DC: Author.

Children's Defense Fund. (1986). *Preventing adolescent pregnancy—what can schools do*. Washington, DC: Author.

Children's Defense Fund. (1985). *Preventing children having children*. Washington, DC: Author.

Children's Defense Fund. (1986). *Welfare and teen pregnancy: what do we know? What do we do?* Washington, DC: Author.

Children's Defense Fund. (1985). *Black and white children in America: Key facts*. Washington, DC: Author.

Chrispeels, J. A. (1987). The family as an educational resource. *Community Education Journal, 14*(3), 10-17.

Cibulka, J. G. (1986). State-level policy options for dropout prevention. *Metropolitan Education, 2*, 13-29.

Clewell, B., Thorpe, M., & Anderson, B. (1987). *Intervention programs in math, science and computer science for minority and female students in grades four through eight*. Princeton, NJ: Educational Testing Service.

Clifford, M. M., & Walster, E. (1973). Research note: The effect of physical attractiveness on teacher expectations. *Sociology of Education, 46*, 248-258.

Comer, J. P. (1987). New Haven's school-community connection. *Educational Leadership, 44*(6), 13-16.

Crowley, J., & Shapiro, D. (1982). Aspirations and expectations of youth in the United States: Part 1 education and fertility. *Youth and Society, 13*(4), 391-422.

Davies, M. & Kandel, D. (1981). Parental and peer influence on adolescents' educational plans: Some further evidence. *American Journal of Sociology, 87*(2), 363-387.

Dempsey, A. D. (December, 1982). *What is an elementary school child? Anglo, black and hispanic teachers' perceptions*. Paper presented at the Annual Meeting of the American Anthropological Association, Washington, DC. (ERIC Document Reproduction Service No. ED 226 853)

Dusek, J. B., Hall, V. C., & Meyer, W. J. (1985). Teacher expectancies. In R. M. Baron (et al.) (Eds.), *Social class, race, and teacher expectations* (pp. 251-269). Hillsdale, NJ: Lawrence Erlbaum Assos.

Edwards, O. L. (1978). Components of academic success: A profile of achieving black adolescents. *The Journal of Negro Education, 45*(4), 408-422.

Ernest, J. (1980). Is mathematics a sexist discipline: In L. H. Fox, L. Brody, & D. Tobin (Eds.), *Women and the mathematical mystique* (pp. 57-65). Baltimore: The Johns Hopkins University Press.

Fauth, G. C. & Jacobs, J. E. (1980). Equity in mathematics education: The educational leader's role. *Educational Leadership, 37*(6), 485-490.

Feldman, R. S. (1985). Nonverbal behavior, race and the classroom teacher. *Theory Into Practice, 24*(1), 45-49.

Fennema, E. (1980). Sex related differences in mathematics achievement: Where and why. In L. H. Fox, L. Brody, & D. Tobin (Eds.), *Women and the mathematical mystique* (pp. 77–93). Baltimore: The Johns Hopkins University Press.

Fennema, E. & Carpenter, T. P. (1981). Sex-related differences in mathematics: Results from national assessment. *Mathematics Teacher, 74*, 554–559.

Fleming, M., & Malone, M. (1983). The relationship of student characteristics and student performance in science as viewed by meta-analysis research. *Journal of Research in Science Technology, 20*(5), 481–495.

Futrell, M. H. (April, 1986). *Restructuring teaching: A call for research*. Paper presented at the Annual Meeting of the American Educational Research Association, San Francisco, CA.

Garner, C. W., & Cole, E. G. (1986). The achievement of students in low-SES settings: An investigation of the relationship between locus of control and field dependence. *Urban Education, 21*(2), 189–206.

George, V. (1986). Talented adolescent women and the motive to avoid success. *Journal of Multicultural Counseling and Development, 14*(3), 132–139.

Gibbs, J. T. (1985). City girls: Psychosocial adjustment of urban black adolescent females. *Sage, 2*(2), 28–36.

Ginsburg, H. & Russell, R. (1981). Social class and racial influences on early mathematical thinking. *Monographs of the Society for Research in Child Development, 46*(6, Serial No. 193).

Gollub, W., & Sloan, E. (1978). Teacher expectations and race and socioeconomic status. *Urban Education, 13*(1), 95–106.

Good, T. L. (1981). Teacher expectations and student perceptions: A decade of research. *Educational Leadership, 38*,415–422.

Good, T. L. (1982). How teachers' expectations affect results. *American Education, 18*(10), 25–32.

Gottfredson, L. (1978). *Race and sex differences in occupational aspirations: Their development and consequences for occupational segregation*. (Rep. No. 254). Baltimore: The Johns Hopkins University, Center for Social Organization of Schools.

Grant, C., & Sleeter, C. (1986). Race, class and gender in education research: An argument for integrative analysis. *Review of Educational Research, 56*(2), 195–211.

Grant, L. (1986, April). Black females' place in desegregated classrooms. *Sociology of Education, 57*(2), 98–110.

Gupta, N. (1982). *The influence of sex roles on the life plans of low-SES adolescents*. Washington, DC: National Institute of Education.

Hammond, R. & Howard, J. P. (1986). Doing what's expected of you: The roots and the rise of the dropout culture. *Metropolitan Education, 2*, 53–71.

Hare, B. (1979). *Black girls: A comparative analysis of self-perception and achievement by race, sex and socioeconomic background*. (Report No. 271). Baltimore, MD: Johns Hopkins University, Center for Social Organization of Schools. (ERIC Document Reproduction Service No. ED 173 503)

Height, D. (1985). What must be done about children having children. *Ebony, 40*(3), 76–84.

Henderson, A. (1987). The first and best way to improve schools. *Community Education Journal, 14*(2), 23–24.

Hennessy, J., & Merrifield, P. (1978). Ethnicity and sex distinctions in patterns of aptitude factor scores in a sample of urban high school seniors. *American Educational Research Journal, 15*(3), 385–389.

Hess, G. A., Jr. (1986). Educational triage in an urban school setting. *Metropolitan Education, 2*, 39–51.

Holliday, B. (1985). Differential effects of children's self-perceptions and teachers' perceptions on black children's academic achievement. *Journal of Negro Education, 54*(1), 71–81.

Holmes, B. J. (1980). *Black students' performance in the national assessments of science and mathematics*. Washington, DC: National Center for Education Statistics.

Hornburger, J., et al. (1977). *Teaching multicultural children*. Boston, MA: Boston University School of Education. (ERIC Document Reproduction Service No. ED 139 045)

Hull, G., Scott, P., & Smith, B. (1982). *All the women are white, all the blacks are men, but some of us are brave: Black women's studies*. Old Westbury, NJ: Feminist Press.

Iadicola, P. (September, 1980). *The relationship of school racial context and student background characteristics upon anglo, black and hispanic secondary school student's educational aspirations and expectations*. Paper presented at the Annual Meeting of the North Central Sociological Association, Cleveland, OH. (ERIC Document Reproduction Service No. ED 233 864)

Interdepartmental Committee on Teenage Pregnancy and Parenting in Maryland. (1986–87). *Networking guide on teenage pregnancy and parenting in Maryland—who's who and who's doing what*. Interdepartmental Committee on Teenage Pregnancy & Parenting in Maryland.

Iowa Department of Public Instruction. (1983). *Multicultural nonsexist education in Iowa schools*. Des Moines, IA: Author.

Irvine, J. (1986). Teacher–student interactions: Effect of student race, sex and grade level. *Journal of Educational Psychology, 78*(1), 14–21.

Jacobowitz, T. (1983). Relationship of sex, achievement and science self concept to the science career preferences of black students. *Journal of Research in Science Teaching, 20*(7), 621–628.

Jeffries and Associates, Inc. (1986). *Facts about blacks*. (Available from Jeffries & Associates, 3540 Wilshire Blvd., Suite 816, Los Angeles, California, 90010).

Johnson, S. T. (1986, November). *Career choices in science and mathematics among talented minority graduates*. Paper presented at the Twelfth Annual Conference on Research on Women in Education.

Jones, E. (1978). Personality characteristics of black youth: A cross cultural investigation. *Journal of Youth and Adolescence, 8*(2), 149–159.

Jones, L. V. (1984). White–black achievement differences: The narrowing gap. *American Psychologist, 39*, 1207–1213.

Jones, R. & Smith, Y. (1980). Black children's associations of class-descriptive labels. *Journal of Black Studies, 10*, 345–353.

Kahle, J. B. (1982). *Double dilemma: Minorities and women in science education*. (Report No. ISBN-0-931682-13-4). Lafayette, IN: Purdue University Research Foundation. (ERIC Document Reproduction Service No. ED 220 78)

Kahle, J. B. (1982). The disadvantaged majority: Biology education for women and minorities. *The American Biology Teacher, 44*(6), 351–357.

Kahle, J. B., Nordland, F. H., & Douglas, C. B. (1976). An analysis of an alternative instructional model for disadvantaged students. *Science Education, 60*(2), 237–245.

Klein, S. S. (Ed.). (1985). *Handbook for achieving sex equity through education*. Baltimore: The Johns Hopkins University Press.

Kortokrax-Clark, D. (1986–1987). The minority teacher shortage: An overview and a solution. *Action in Teacher Education, 8*(4), 7–13.

Ladner, J. A. (1987). Black teenage pregnancy: A challenge for educators. *Journal of Negro Education, 56*(1), 53–63.

Lee, C. C. (1982). The school counselor and the Black child: critical roles and functions. *Journal of Non-White Concerns, 10*(3), 94–101.

Leinhardt, G., Seewald, A., & Engel M. (1979). Learning what's taught: Sex differences in instruction. *Journal of Educational Psychology, 71*(4), 432–439.

Lewis, S., et al. (1985). Achieving sex equity for minority women. In S. Klein (Ed.), *Handbook for achieving sex equity through education* (pp. 365–390). Baltimore: The Johns Hopkins University Press.

Lightfoot, S. (1976). Socialization and education of young black girls in school. *Teachers College Record, 78*, 239–262.

Lindsay, B. (1984). Pursuing the baccalaureate degree in the united states: The case of african american women. In, *World yearbook of education* (pp. 139–152). New York: Kogan Press.

Lockheed, M., Thorpe, M., Gunn, J., Casserly, P., & McAloon, A. (1985). *Sex and ethnic differences in middle school mathematics, science and computer science: What do we know?* Princeton, NJ: Educational Testing Service.

Malcolm, S. (1984). *Equity and excellence: Compatible goals, an assessment of programs that facilitate increased access and achievement of females and minorities in K–12 mathematics and science education* (AAAS Pub. No. 84–14). Washington, DC: American Association for the Advancement of Science.

Malcolm, S., Hall, P., & Brown, J. (1976). *The double bind: The price of being a minority woman in science*. (AAAS Report No. 76-R-3). Washington, DC: American Association for the Advancement of Science.

Marrett, C. B. (1982). *Minority females in high school mathematics and science*. Madison, Wisconsin: Wisconsin Center for Education Research. (ERIC Document Reproduction Service No. ED 231 611)

Mecklenburg, M., & Thompson, P. (1983). The adolescent family life program as a prevention measure. *Public Health Reports, 98*(1), 21–29.

Merenda, D. (1986). Community education and volunteerism: The difference is mainly historical. *Community Education Journal, 13*(4), 4–5.

Michigan Department of Social Services. *Adolescent pregnancy and teen parenting: No easy answers*. (DSS Pub. 612). Lansing, MI: Author.

Milwaukee Public Schools. (1982). *Project rise: A guide to school effectiveness, local planning guide*.

Morgan, H. (1980). How schools fail black children. *Social Policy, 10*, 49–54.

Murray, S. (1982). *Investigating and understanding the educational needs of black girls*. American Institute for Research. (ERIC Document Reproduction Service No. ED 267 166)

Myers, H. F., & King, L. M. (1983). Mental health issues in the development of the black american child. In G. J. Powell, J. Yamamoto, A. Romero, & A. Morales (Eds.), *The psychosocial development of minority group children* (pp. 275–306). New York: Brunner/Mazel.

National Black Child Development Institute. (1986). *Beyond the stereotypes: A guide to resources for black girls and young women*. Washington, DC: Author.

National Foundation for the Improvement of Education. (1986). *Operation rescue: A blueprint for success*. Washington, DC: Author.

Neisser, V. (Ed.). (1986). *The school achievement of minority children*. Hillsdale, NJ: Lawrence Erlbaum, Assos.

Norton, D. G. (1983). Black family life patterns, the development of self and cognitive development of black children. In G. J. Powell, J. Yamamoto, A. Romero, & A. Morales (Eds.), *The psychosocial development of minority group children* (pp. 181–193). New York: Brunner/Mazel.

Operation Rescue, Reclaiming our Youth. (Jan/Feb. 1987). *NEA Today*, pp. 10–11.

Orozco, P. (1985). Teenage pregnancy—a trip to the dead zone. *Nuestro*, *9*(1), 20–23.

Padilla, E. R., & Wyatt, G. E. (1983). The effects of intelligence and achievement testing on minority group children. In G. J. Powell, J. Yamamoto, A. Romero, & A. Morales (Eds.), *The psychosocial development of minority group children* (pp. 417–437). New York: Brunner/Mazel.

Pendergast, P., Zdep, S. M. & Sepulueda, P. (1974). Self image among a national probability sample of girls. *Child Study Journal*, *4*(3), 103–114.

Phelan, W. T. (1987). Obstacles to high school graduation: The real dropout problem. *Journal of Educational Equity and Leadership*, *7*(3), 223–234.

Picard, M., & Hayes, E. (1986). *Manhattan teen pregnancy network resource guide: Services for young adults*. The Manhattan Teen Pregnancy Network.

Polit, D. F., & Kahn, J. R. (1987). Teenage pregnancy and the role of the schools. *Urban Education*, *22*(2), 131–153.

Pollard, D. S. (1979). Patterns of coping in black school children. In A. W. Boykin, et al. (Eds.), *Research directions of black psychologists* (pp. 188–209). New York: Russell Sage.

Portes, A. & Wilson, K. (1976). Black-white differences in educational attainment. *American Sociological Review*, *41*, 414–431.

Powell, G. J. (1983). Coping with adversity: The psychosocial development of Afro-American children. In G. J. Powell, J. Yamamoto, A. Romero, & A. Morales (Eds.), *The psychosocial development of minority group children* (pp. 49–76). New York: Brunner/Mazel.

Powell, G. J. (1983). School desegregation: The psychological, social, and educational implications. In G. J. Powell, J. Yamamoto, A. Romero, & A. Morales (Eds.), *The psychosocial development of minority group children* (pp. 438–473). New York: Brunner/Mazel.

Reed, D. F. (1986). Wanted: More black teacher education students. *Action in Teacher Education*, *8*(1), 31–36.

Reid, P. T. (1982). Socialization of black female children. In P. W. Berman, & E. R. Ramey (Eds.), *Women: A developmental perspective* (pp. 137–155). Washington, DC: Department of Health and Human Services.

Rodriquez, A. M. (1983). Educational policy and cultural plurality. In G. J. Powell, J. Yamamoto, A. Romero, & A. Morales (Eds.), *The psychosocial development of minority group children* (pp. 499–512). New York: Brunner/Mazel.

Rosenshine, B. V. (1978). Academic engaged time, content covered, and direct instruction. *Journal of Education, 160*(3), 38–66.

Rowe, M. B. (1986). *Science and fate control: Prospects for women*. Paper presented at the Annual Meeting of the American Educational Research Association, San Francisco, California.

Rubovits, P., & Maehr, M. (1973). Pygmalion black and white. *Journal of Personality and Social Psychology, 25*(2), 210–218.

Rudine, S. (1983). Strong black girls: A ten year old responds to fiction about afro-americans. *Journal of Research and Development in Education, 16*(3), 22–28.

Rumberger, R. (1983). Dropping out of high school: The influence of race, sex and family background. *American Educational Research Journal, 20*(2), 199–220.

Rumberger, R. (1982). Recent high school and college experiences of youth: Variations by race, sex and social class. *Youth and Society, 13*(4), 449–471.

Sadker, M., & Sadker, D. (April, 1985). *Promoting effectiveness in classroom instruction*. Paper presented at the Annual Meeting of the American Educational Research Association, New Orleans, Louisiana.

Sadker, M., & Sadker, D. (1982). *Sex equity handbook for schools*. New York: Longman Press.

Schab, F. (1979). Adolescence in the south: A comparison of blacks and whites not prepared for the world of work. *Adolescence, 14*(55), 600–605.

Scott-Jones, D. (1984). Family influences on cognitive development and school achievement. *Review of Research in Education, 11*, 259–304.

Scott-Jones, D. & Clark, M. (1986). The school experiences of black girls: The interaction of gender, race and socioeconomic status. *Phi Delta Kappan, 67*(7), 520–526.

Shade, B. J. (1978). Social-psychological characteristics of achieving black children. *Negro Educational Review, 29*, 80–86.

Shakeshaft, C. (1986). A gender at risk. *Phi Delta Kappan, 67*(7), 499–503.

Silvestri, K. & Scambio, E. (1987). K–12 education as a community activity. A framework for home–school collaboration. *Community Education Journal, 14*(4), 28–29.

Simmons, B. (1980). Sex role expectations of classroom teachers. *Education*, 249–259.

Simmons, R. G., Brown, L., Bush, D. M. & Blyth, D. A. (1978–79). Self-esteem and achievement of black and white adolescents. *Social Problems, 26*, 86–96.

Sinclair, E. (1983). Important issues in the language development of the black child. In G. J. Powell, J. Yamamoto, A. Romero, & A. Morales (Eds.), *The psychosocial development of minority group children* (pp. 490–498). New York: Brunner/Mazel.

Skypek, D. H. (1980). Girls need mathematics, too. *Arithmetic Teacher, 27*(6), 5–7.

Smith, E. J. (1982). The black female adolescent: A review of the educational, career and psychological literature. *Psychology of Women Quarterly, 6*(3), 261–288.

Smith, E. J. (1981). The career development of young black females: The forgotten group. *Youth & Society, 12*(3), 277–312.

Smith, G. (1980). Developing career cognizance, goals and choices in minorities. *Journal of Non-White Concerns, 9*(1), 20–22.

Smith, N. J., & Wright, E. L. (1986). *A study of educational equity in USD 445: Gender balancing*. (Unpublished paper)

Snyder, T. D. (1986). Trends in education. *Principal, 66*(1), 8–12.

Stevenson, G. (1975). Counseling black teenage girls. *Occupational Outlook Quarterly, 19*(2), 3–13.

Teahan, J. E. (1974). Predominant socioeconomic class school climate on expectations of success among black students. *The Journal of Negro Education, 43*(2), 245–255.

Tesconi, C. A. (1984). Multicultural education: A valued but problematic ideal. *Theory Into Practice, 23*(2), 87–97.

Thomas, V. (1986). Career aspirations, parental support and work values among black female adolescents. *Journal of Multicultural Counseling and Development, 14*(4), 177–185.

Thomas, V. G., & Shields, L. C. (1987). Gender influences on work values of black adolescents. *Adolescence, 22*(85), 37–43.

Timberlake, C. (1981). Attitudinal differences of black female secondary students which may influence their graduating from high school. *High School Journal, 66*(2), 123–129.

Toles, R., Schulz, E. M., & Rice, W. K., Jr. (1986). A study of variation in dropout rates attributable to effects of high schools. *Metropolitan Education, 2*, 30–38.

Turner, H. M., et al. (1983). *Factors influencing persistence/achievement in the science and health professions by black high school and college women. Final report*. Atlanta, GA: Center for Research on Women in Science. (ERIC Document Reproduction Service No. ED 240 200)

U. S. Department of Education, Office of Educational Research and Improvement, Center for Education Statistics. (1986). *The condition of education*. Washington, DC: U. S. Government Printing Office.

Walker, E. (1987). Schooling and minority adolescents' mobility goals: A causal model. *Journal of Educational Equity and Leadership, 7*(2), 109–128.

Warring, D., Johnson, D. W., Maruyama, G., & Johnson, R. (1985). Impact of different types of cooperative learning on cross-ethnic and cross-sex relationships. *Journal of Educational Psychology, 77*(1), 53–59.

Washington, V. (1980). Teachers in integrated classrooms: Profiles of attitudes, perceptions, and behavior. *The Elementary School Journal, 80*(4), 193–201.

Weiner, R. (Ed.). (1987). *Impact on the schools: Teen pregnancy, a special report from the Education Research Group*. Alexandria, VA: Capitol Publications, Inc.

Weiss, L. (1985). Without dependence on welfare for life: Black women in the community college. *The Urban Review, 17*(4), 233–255.

Western, R. D. (1986). School retention and the problem of civic exclusion. *Metropolitan Education, 2*, 2–4.

Whitehead, G., Smith, S., & Eichorn, J. (1980). The effects of subject's race and other's race on judgements of causality for success and failure. *Journal of Personality, 50*(2), 193–202.

Wiley, M. G., & Eskilson, A. (1978). Why did you learn in school today? Teachers' perceptions of causality. *Sociology of Education, 51*, 261–269.

Willing, A. C., Harnisch, D. L. Hill, K. T., & Maehr, M. L. (1983). Sociocultural and educational correlates of success–failure attributions and evaluation anxiety in the school setting for black, hispanic, and anglo children. *American Educational Research Journal, 20*(3), 385–410.

Winters, A., & Frankel, J. (1984). Women's work role as perceived by lower status white and black female adolescents. *Adolescence, 19*(74), 403–415.

Wooldridge, P., & Richman, C. (1985). Teachers' choice of punishment as a function of a student's gender, age, race and IQ level. *Journal of School Psychology, 23*, 19–29.

Wright, S. J. (1981). Education of minority students: Problems and challenges. In Educational Testing Service Office for Minority Education (Ed.), *What can public schools do to foster academic excellence for poor and minority students? Proceedings of an invitational conference, May 1980* (pp. 11–19). Princeton, NJ: Educational Testing Service. (ERIC Document Reproduction Service Nu. ED 243 978).